Before the
COPYRIGHT ROYALTY BOARD
LIBRARY OF CONGRESS
Washington, D.C.

In re DETERMINATION OF ROYALTY RATES AND TERMS FOR MAKING AND DISTRIBUTING PHONORECORDS (Phonorecords III)	Docket No. 16–CRB–0003–PR (2018-2022) (Remand)

ADDITIONAL MATERIALS SUBMISSION OF COPYRIGHT OWNERS

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COPYRIGHT OWNERS' BRIEF IN RESPONSE TO THE ADDITIONAL MATERIALS ORDERS

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Glossary of Abbreviations Used in Copyright Owners' Brief in Response to the Additional Materials Orders

Abbreviation	Document
Additional Materials Orders or AMO	Dec. 9 Order and Jan. 6 Order together
CO Br.	Copyright Owners' Initial Remand Submission dated April 1, 2021, eCRB Docket No. 23854, Apr. 1, 2021
CO Reply Br.	Reply Remand Submission of Copyright Owners, eCRB Docket No. 25425, July 2, 2021
COF	Proposed Findings of Fact of Copyright Owners, eCRB Docket No. 3418, May 11, 2017
Dec. 9 Order	Notice and Sua Sponte Order Directing the Parties to Provide Additional Materials, eCRB Docket No. 25965, Dec. 9, 2021
Eisenach RWRT	CO Reply Br., Remand Written Rebuttal Testimony of Jeffrey A. Eisenach, PhD, eCRB Docket No. 25425, July 2, 2021
FD	Final Determination, eCRB Docket No. 3473, Nov. 5, 2018
Google PFF & COL	Google Inc.'s Proposed Findings of Fact and Conclusions of Law, eCRB Docket No. 3419, May 11, 2017
Google's Amended Rate Proposal	Google's Amended Proposed Rates and Terms, May 11, 2017
Initial Determination	Initial Determination, eCRB Docket No. 2288, Mar. 19, 2018
Jan. 9 Order	Order Granting in Part and Denying in Part Copyright Owners' Motion for Reconsideration or, in the Alternative, Clarification, eCRB Docket No. 26007, Jan. 9, 2022
Joint Br.	Joint Submission, Opening Brief, eCRB Nos. 23849 -53, Apr. 1, 2021
Joint Rate Proposal	Joint Submission, Services' Joint Rate Proposal, eCRB Nos. 23849 -53, Apr. 1, 2021
Joint Submission	Joint Written Direct Remand Submission, eCRB Nos. 23849 -53, Apr. 1, 2021

Reconsid. Mot.	Copyright Owners' Motion for Reconsideration, eCRB Docket No. 25979, Dec. 17, 2021
Reconsid. Reply	Reply In Further Support of Motion for Reconsideration, eCRB Docket No. 26006, Jan. 5, 2022
Rehearing Order	Order Granting in Part and Denying in Part Motions for Rehearing, eCRB Docket No. 3603, Jan. 4, 2019
Remand Order	Order Regarding Proceedings on Remand, eCRB Docket No. 23390, Dec. 15, 2020
Services' Joint Reply to COF & COL	Services' Joint Reply to the Copyright Owners' Proposed Findings of Fact and Conclusions of Law, eCRB Docket No. 14087, May 23, 2017
Services' Remand Proposal	Services' Proposal for Remand Proceedings, eCRB Docket No. 23383, Dec. 10, 2020
Spotify PFF & COL	Spotify's Proposed Findings of Fact and Conclusions of Law, eCRB Docket No. 3421, May 11, 2017
Working Proposal or WP	Various contemplated rate structures and rates referenced in the Dec. 9 Order and Jan. 6 Order

Copyright Owners respectfully submit this brief in response to the Judges' December 9, 2021 *Notice and Sua Sponte Order Directing the Parties to Provide Additional Materials*, eCRB Docket No. 25965 (the "Dec. 9 Order"), and the January 6, 2022 *Order Granting in Part and Denying in Part Copyright Owners' Motion for Reconsideration or, in the Alternative, Clarification*, eCRB Docket No. 26007 (the "Jan. 6 Order" and, together with the Dec. 9 Order, the "Additional Materials Orders" or "AMOs"), including the various contemplated rate structures and rates referenced therein (the "Working Proposal" or "WP") and the specific questions posed by the Judges.[1]

INTRODUCTION

The AMOs and the WP focus attention on the rates and rate structure and suggest that the Judges are considering new approaches to both. As shown below, there are important concerns about the contemplated approach. First and foremost, certain of the actions being contemplated would violate *Johnson*'s mandate and principles of law of the case. *Johnson* affirmed key findings of the Board that the WP appears to consider revising, despite the absence of any new evidence that could prompt such reevaluation and in the face of the Circuit's affirmance of such findings. The contemplated revisiting of issues that were either not appealed or were affirmed on appeal raises procedural and substantive concerns that are not solved by the AMOs or these additional submissions. Such issues include potential elimination of the TCC prong, which was not even the subject of appeal—and which the Services, the Majority, and the Dissent all agreed was needed as

[1] *See* "Additional Questions" 1 through 4, and subparts thereof. (Jan. 6 Order at 12-14.) While this brief's sections are not organized by or in the order of those questions, the brief responds to all of those questions. For convenience, the brief identifies questions responded to in each section, although some questions are covered in multiple sections, and the identifications are all provided without limitation.

a backstop to the revenue-based rate to protect against acknowledged revenue diminution—as well as reconsideration of the 15.1% revenue rate, which was specifically affirmed in detail by *Johnson*.

Thus, before addressing the AMOs' substantive questions, Copyright Owners reiterate their belief, as expressed in detail in their Motion for Reconsideration, that this procedure and the WP should be abrogated and the remand conducted on the three narrow, agreed issues that formed the noticed scope of remand. The Services' utter failure to build a case on any of these three issues (including their complete reversal and capitulation on their primary appeal argument that they would suffer disruption and "runaway rates" from an uncapped TCC prong) would then call for institution of the FD rates and terms after remand.

Turning to the WP itself, Copyright Owners agree with the Judges' finding that the revenue rate was calculated using an input that understated fair royalties. The [redacted]% combined royalty rate is far too low, as the Board recognized in the *Final Determination*, and the 15.1% revenue rate is too low as a result. Copyright Owners agree that an upwards adjustment in the rate would be consistent with the record and the 801(b) factors, but still submit that these corrections should be implemented as part of *Phonorecords IV*, as *Johnson* affirmed the revenue rate derivation methodology and rate determinations here. While higher rates are appropriate, revisiting this issue, which was nowhere intimated in the noticed scope of remand and would conflict with *Johnson*, would likely result in further appeals and more years of rate uncertainty.

Examining the WP formula, it is troubling that the rate derivation examples provided in the AMOs predict *lower* percent of revenue rates despite *higher* combined royalty rates. This occurs solely because the WP erroneously substitutes an incorrect and higher 3.82:1 ratio (of sound recording to musical work royalties) instead of the 2.5:1 Shapley ratio which the Board determined and *Johnson* affirmed. This erroneous ratio delivers a far higher percentage of royalties to record companies, and a far lower percentage to Copyright Owners than the affirmed Shapley analyses indicate to be fair.

The Judges in the AMOs and WP recognize that they are constrained by *Johnson*. Indeed, the Judges cite to the very passage in *Johnson* affirming the 2.5:1 ratio in acknowledging that they are not permitted to adjust the affirmed rate derivation. Using the affirmed ratio and the higher combined royalties, any newly-derived revenue rate—mathematically—*must* be higher than 15.1% *Johnson* upheld. Indeed, the examples in the AMOs, when corrected to employ the affirmed 2.5:1 ratio, deliver revenue rates around [redacted]%. Those are the appropriate revenue rates, and such an increase should be implemented—but as part of *Phonorecords IV*.

ARGUMENT

I. The Additional Materials Orders and Working Proposal are not consistent with the mandate and the noticed scope of the remand

The Jan. 6 Order denied Copyright Owners' request for reconsideration, and Copyright Owners do not here reiterate all of their arguments concerning the procedural and substantive defects in this change to the remand scope. *See Copyright Owners' Motion for Reconsideration*, eCRB Docket No. 25979, Dec. 17, 2021 ("Reconsid. Mot."), and *Reply In Further Support of Motion for Reconsideration*, eCRB Docket No. 26006, Jan. 5, 2022 ("Reconsid. Reply"). However, those arguments and objections are incorporated in these papers and Copyright Owners stress their expressed concerns as to this process. *Id.*[2]

[2] Copyright Owners strongly disagree with the statement in the Jan. 6 Order that Copyright Owners' Motion for Reconsideration "did not assert that the Judges' post-remand procedures . . . are inconsistent with any APA provisions." (Jan. 6 Order at 7, fn. 11.) Copyright Owners explained in the Motion how the Dec. 9 Order's proposed change in course would be "arbitrary and capricious" (Reconsid. Mot. at 7, 19; *see* 5 U.S.C. § 706(2)(A)), contravene the requirements of "due process" (Reconsid. Mot. at 16-20; *see* 5 U.S.C. § 706(2)(B)), and exceed "the scope of the Circuit's mandate" (Reconsid. Mot. at 13-15; *see* 5 U.S.C. § 706(2)(A), (C)). Those are all APA violations.

A. Implementation of a universal TCC prong was not appealed, and elimination of a TCC prong is not within the mandate and scope of remand[3]

Copyright Owners object to the wholesale elimination of the TCC prong. The Board, the Dissent and the Services *proposed* TCC prongs for all offerings, and the implementation of a TCC prong—for every offering—was neither appealed nor reversed by the Circuit. All 10 of the *Phonorecords II* offering-specific rate structures had TCC prongs, with 7 offerings having "uncapped" or true[4] TCC prongs, and 3 having "caps" on the TCC prong. The Final Determination implemented a *universal* true TCC prong. (Final Determination at 35-36, eCRB Docket No. 3473, Nov. 5, 2018 ("FD").) The Dissent favored adoption of the *Phonorecords II* rate structure in full, *including* the seven uncapped and three capped TCC prongs. (*See* FD, Dissent at 4, 12.)[5]

There was no appeal by the Services of the universal inclusion of TCC prongs and none argued for elimination of the universal mixed TCC prong in *Johnson*. They objected only to the expansion of the *true* TCC to the three offering types that had previously been "capped." *Johnson v. Copyright Royalty Board*, 969 F.3d 363, 372, 382-83 (D.C. Cir. 2020). All four Services continue to advocate for a *universal* mixed TCC prong in this remand, which is "uncapped" for a majority of offering types. (*See* Joint Written Direct Remand Submission ("Joint Submission"), Services' Joint Rate Proposal at 2-3, eCRB Docket No. 23849, Apr. 1, 2021 ("Services' Joint Rate Proposal") (proposing a true TCC for six offering types and a "capped" TCC for the remaining

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[3] This subsection addresses, without limitation, issues raised in questions 1.a.-c. and 2 raised in the Jan. 6 Order.

[4] (*See* Copyright Owners' Initial Remand Submission at 38 n.18, eCRB Docket No. 23854, Apr. 1, 2021 ("CO Br.") (explaining that the terminology of "uncapped" and "capped" TCC mischaracterizes the TCC prong and that "true" TCC better captures the TCC prong as adopted in the FD).)

[5] For reasons discussed below, while the WP contains an error, it acknowledges that the Dissent's contemplated adoption of the *Phonorecords II* settlement agreement rates is foreclosed by *Johnson's* affirmance of both the FD's finding that the rates in the *Phonorecords II* settlement agreement were too low and the Shapley analysis resulting in the precise percentage rates and TCC rates derived from that analysis.

three).) The Services even affirmatively argue that there is *consensus* on a true TCC rate for some offerings. (*See* Services' Joint Supplemental Brief at 17, eCRB Docket No. 25925, Nov. 15, 2021 ("there is no dispute in this remand proceeding" that the TCC should remain uncapped for bundled offerings).) Indeed, through the hearing, appeal and remand, every Service has argued for a revenue prong and a TCC prong for *every* offering type.[6]

The Services' have consistently promoted the TCC prong throughout this proceeding as the antidote to the serious revenue diminution and revenue measurement risks that are ever-present in a percent of revenue structure, arguing that it is necessary to protect Copyright Owners from unfairly low royalties. (*See e.g.*, Tr. 685:8-686:1 (Katz) (stating that the TCC is "protection on the downside for Copyright Owners"); Tr. 1200:9-16 (Leonard) (agreeing that the TCC "kicks in" to protect Copyright Owners "if revenue, including subscribers' revenue declines"); Tr. 5226:5-12 (Leonard) (stating that [redacted]); Spotify's Proposed Findings of Fact and Conclusions of Law at SPFF107, eCRB Docket No. 3421, May 11, 2017 ("Spotify PFF & COL"") (stating that the TCC "protects Copyright Owners from depressed revenues" and acts to "alleviat[e] the Copyright Owners' concerns with revenue deferment, revenue hiding, or revenue mis-measurement issues"), SPFF108 (stating that the "TCC works toward a fair return to the Copyright Owners by protecting them against revenues that are too low and do not provide that fair return."); Google's Proposed Findings of Fact and Conclusions of Law at GPFF7, eCRB Docket No.

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[6] (*See e.g.*, Amazon Digital Services LLC's Proposed Rates And Terms, eCRB Docket No. 14068, May 11, 2017; Written Direct Statement of Google Inc. at Introductory Memorandum to the Written Direct Statement of Google Inc. at 3 & n.1, eCRB Docket No. 13957, Nov. 1, 2016; Google Inc.'s Proposed Terms (HX-1701); Google Inc.'s Amended Proposed Rates And Terms at 1, May 11, 2017; Pandora Media, Inc.'s Proposed Findings of Fact and Conclusions of Law at A-6 – A-10, eCRB Docket No. 3420, May 11, 2017; Second Amended Proposed Rates And Terms of Spotify USA Inc., eCRB Docket No. 13813, May 11, 2017.)

3419("Google PFF & COL") ("The TCC prong protects the interests of Copyright Owners and addresses problems associated with revenue attribution and deferment by linking the musical works rate to sound recording payments."), GPCL17 ("The TCC prong adequately protects the music publishers from any concerns about how services define revenue."); *see also* FD, Dissent at 52-53 (collecting testimony). Elimination of the TCC prong is outside the scope of the Circuit's mandate and avoids the issue that *was* remanded, namely, whether the Services have evidence of economic harm sufficient to justify reapplying the TCC "cap" to the three offering types that were capped historically. (*See* Reconsid. Motion at 9-13.) They do not. *See infra* at Section II.C.

B. *Johnson* affirmed the Board's derivation of the 15.1% revenue rate[7]

As discussed in the Motion for Reconsideration papers, *Johnson* specifically addressed and affirmed the Board's rate derivation methodology, explicitly rejecting the Services' appeal on that issue. (Reconsid. Reply at 1-3.)

The Jan. 6 Order acknowledges that *Johnson* does not permit the Judges "to change the Board's methodology and calculations" that *Johnson* affirmed, finding them the "type of line-drawing and reasoned weighing of the evidence [that] falls squarely within the Board's wheelhouse as an expert administrative agency." (Jan. 6 Order at 9 n.13 (citing *Johnson*, 969 F.3d at 384, 386).) But the Jan. 6 Order mistakenly reads this *Johnson* holding as applying to the "derivation of the TCC percentage" and the "methodology and calculations that generated the 26.2% TCC computation." (*Id.*) Instead, the *Johnson* quote was about the derivation of the 15.1% revenue rate percentage; *Johnson* bars the Judges from changing the 15.1% of revenue determination. Specifically rejecting every challenge by the Services, *Johnson* stated:

[7] This subsection addresses, without limitation, issues raised in questions 1.a., and 3 (including certain subparts thereof) of the Jan. 6 Order.

> To select **the specific revenue rate** . . . the Board began by [description of process]. . . . **Substantial evidence supports that judgment.** …
>
> The Board proceeded to calculate the zone of reasonableness **for the revenue rate** by [description of process] …
>
> The Board ultimately settled on **the revenue rate of 15.1%** "based on the highest value of overall royalties predicted by Professor Marx's model and the ratio of sound recording to musical work royalties determined by Gans's analysis." … When it came to the expert evidence on which the Board chose to rely—the "ratio of sound recording to musical work royalties that Gans derived from his analysis"—the Board specifically found that aspect of Gans' analysis to be reasonable and "informative." **That type of line-drawing and reasoned weighing of the evidence falls squarely within the Board's wheelhouse as an expert administrative agency.**

Johnson, 969 F.3d at 385-86.[8] It is thus this 15.1% revenue rate percentage and the Board's derivation thereof that the Board may "not alter," as acknowledged in the Jan. 6 Order.[9] Yet, that appears to be precisely what the WP contemplates changing. (*See e.g.*, Dec. 9 Order at 2-4 (explaining that under the WP "the royalty calculation on the percent-of-revenue prong (not the TCC prong) would be calculated differently"); Jan. 6 Order at 9-11 (setting forth various potential recalculations of the revenue prong).) (*See also* cases cited in Reconsid. Mot. at 13-15, demonstrating this contemplated change is not only outside of the Circuit's mandate but barred by the Circuit's affirmance of this aspect of the FD.)

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[8] Unless stated otherwise, all emphasis herein is added and all quotation marks and citations are omitted.

[9] As discussed in the Reconsid. Mot. at 4-6, the Order Regarding Proceedings on Remand (the "Remand Order") neither identified revenue percentage derivation as an issue, nor requested briefing or evidence on that issue. (Remand Order at 1-2, eCRB Docket No. 23390, Dec. 15, 2020.) Rather, all agreed to reopen the evidentiary record for the limited purpose of resolving the "rate structure issue" only. (*Id.* at 1-2.) The description in the Jan. 6 Order of the WP as a proposal for a "form of rate structure" does not bring it within this scope. (Jan. 6 Order at 2.) The WP outlines only an erroneous rate percentage derivation formula, and the Jan. 6 Order bluntly acknowledges that, beyond considering eliminating the TCC prong, "the Judges have not identified a rate structure within which a rate potentially calculated as set forth above would be adopted, if at all." *Id.* at 11.

C. The Working Proposal is not sufficiently defined as to rate structure to allow meaningful opportunity to evaluate or comment

The Dec. 9 Order calls for submissions on "the rate structure proposal" that "no participant has specifically proposed." (Dec. 9 Order at 1.) The Reconsid. Mot. requested clarification on the terms of the rate structure proposal. The Jan. 6 Order stated that Copyright Owners' request "misses the point," and that, as noted, beyond possible elimination of the TCC prong, "the Judges have not identified a rate structure . . . . that would be adopted[.]" (Jan. 6 Order at 11.) The Jan. 6 Order also states that "the Judges are providing the parties with a 'heads up' in the form of their [WP], so that the parties can prepare arguments and appropriate evidence or testimony that would serve to support, reject or modify the [WP]." (*Id.* at 5.)

Together, the AMOs appear to primarily ask for argument about possible rate structures, and do not provide a meaningful "heads up" because they do not outline what the critical terms would be for the novel rate structure. (*See* Jan. 6 Order at 11 (stating that the Judges' rate structure remains "to be determined based on the evidence"); *id.* at 12 (inviting submission regarding whether the WP is, for example, "compatible with… [a] rate structure that contains or omits Mechanical Floors for all offerings"); Reconsid. Mot. at 21-28.) Copyright Owners maintain that the identity of the rate structure proposal remains too unknown for the AMOs to afford the meaningful notice or opportunity to evaluate and address concerns with a novel rate structure as *Johnson* requires, although they will address the rate structure issues as best they can. Nonetheless, the due process and Administrative Procedure Act concerns identified herein and in Copyright Owners' Reconsid. Mot. remain.

II. Elimination of the true TCC prong would be inconsistent with the Final Determination, the record and the 801(b) standard[10]

A. The true TCC prong was adopted to protect against a revenue diminution problem that has only grown worse since the hearing

1. The Services admitted and the Board, Dissent and Johnson recognized the problem of revenue diminution

The Board adopted the "true" TCC to address problems acknowledged by the Services and unanimously recognized by the Judges in the FD: a pure percent of revenue structure leaves licensors vulnerable to licensees' revenue diminution practices resulting in low royalty payouts. As the Board found:

> [A]n uncapped TCC prong effectively imports into the rate structure the protections that record companies have negotiated with services to avoid the undue diminution of revenue through the practice of revenue deferral. The Judges find that the present record indicates that the Services do seek to engage to some extent in revenue deferral in order to promote their long-term growth strategy. . . . It appears to the Judges that the nature of the downstream interactive streaming market, and its reliance on scaling for success, results necessarily in a competition for the market rather than simply competition in the market. **Revenue deferral argues against adopting a pure percent-of-revenue rate structure.**

(FD at 36; *see also id.* at 21.) The Board recognized that the Services could diminish revenues in numerous ways: they "might focus on long-term profit maximization, thereby deferring shorter-term profits through temporarily lower downstream pricing in a manner that suppresses revenue over that shorter-term"; they "might also use music as a 'loss leader,' displacing streaming revenue to encourage consumers to enter into the so-called economic 'ecosystem' of the streaming services . . ."; and they "might obscure royalty-based streaming revenue by offering product bundles that include music service offerings with other goods and services . . . ." (*Id.* at 20.) The Board also

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[10] This section addresses, without limitation, issues raised in questions 1.a.-1.c., 2, and 3.a.-d. (including subparts thereof) of the Jan. 6 Order.

noted that the Services' own experts acknowledged that the Services have an "incentive and a capacity to minimize the amount of revenue that is attributed to the revenue base." (*Id.*) Implementing the true TCC for all offering types was designed to protect Copyright Owners from those revenue diminution practices. (*Id.* at 36; *see also* record citations at pp. 5-6, *supra.*)

The Dissent agreed that the Services engage in revenue diminution. (*See* FD, Dissent at 59 ("I find that the record indicates that the services do seek to engage to some extent in revenue deferral in order to promote their long-term growth strategy.").) The Dissent also agreed that "the potential displacement, deferment, bundling or attribution indeterminacy of a revenue-based structure" merited implementation of a robust alternative prong to a revenue metric in order to protect Copyright Owners, even while disagreeing with the true TCC as the remedy. (*Id.* at 5.)

The Services did not appeal the Judges' revenue diminution holdings, and *Johnson* recognized that the Board adopted the "universal" true TCC to protect Copyright Owners from being "harmed by the interactive streaming services' revenue deferral strategies (such as student and family discount programs)." *Johnson*, 969 F.3d at 372. That the Services engage in revenue diminution is law-of-the-case. *E.g.*, *United States v. Thomas*, 572 F.3d 945, 948-49 (D.C. Cir. 2009).

2. The record overwhelmingly shows the Services' revenue diminution

The Services' revenue diminution was admitted by the Services and their experts. Such evidence was summarized in CO Br. at 40-42, and included: [redacted] (Tr. 2081:13-2084:15 (McCarthy)); [redacted]

[redacted] (McCarthy WDT ¶¶ 50-51 (HX-1060); Page WDT ¶¶ 58, 60 (HX-1061); *see also* Tr. 1739:19-1740:1 (Page)); [redacted] (Tr. 1472:4-1475:15, 1481:17-1487:18, 1505:19-1505:17 (Mirchandani); HX-3007); [redacted] (HX-113 at 1; HX-3225 at 1-2); [redacted] (HX-546 at 6, Rysman WRT ¶ 18 (HX-3032); HX-3209 at 7, 18, 20, 22); [redacted] (HX-2704 at 23); and testimony by the Copyright Owners' expert, Dr. Rysman, explaining the various incentives that drive interactive services to forego maximization of current direct profits (Rysman WDT ¶¶ 13-33 (HX-3026).)

Additional record evidence of revenue diminution and mismeasurement includes:

- [redacted]. (HX-1373 at AMZN00076220 lines 5, 8 and 13 ([redacted]); *see also* HX-3056 ([redacted]

[redacted]).)

- Testimony by Spotify's expert, Dr. Marx, that [redacted] such as with diversified companies like Apple, Google, and Amazon, there are revenue measurement problems and concerns with revenue transparency. (Tr. 1961:9-1965:25-1966:12 (Marx).)[11]
- Testimony by Apple's expert, Dr. Ghose, that a revenue-sharing rate structure creates a "perverse incentive for the downstream firm (which may have other, complementary business lines that do not rely on the upstream firm) to employ a 'loss leader' strategy that hurts the upstream firm in an effort to drive demand for the complementary products." (Ghose WDT ¶ 66 (HX-1617).)

The indisputable evidence of revenue diminution caused Google to propose the true ("uncapped") TCC for all offerings. (Google PFF & COL at GPFF6 ("To address the Panel's questions regarding revenue displacement and deferment, [Google's] proposal pairs the percentage-of-revenue rate in a greater-of rate structure with an uncapped TCC rate component.") & p. 29 ("Google's Amended Proposal addresses concerns of revenue deferment or displacement associated with business models that developed under the existing regulations.").) The Board accepted that proposal in the FD. (FD at 35-36.)[12]

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[11] Dr. Katz agreed with the necessity of backstops for revenue measurement and deferment problems and in response to questioning by Judge Strickler and Judge Barnett, suggested higher minimums (Tr. 5060-5061) and a change to the bundled revenue definition and allocation (Tr. 5055-5059).

[12] While the Services and the Dissent disagreed with the Majority that the TCC backstop to a percent of revenue structure should be universally uncapped, they all agreed that some TCC prong should exist as a backstop for all offerings, and acknowledged that having only a percent of revenue rate was unacceptable due to revenue diminution

3. *The evidence on remand only reinforced the revenue diminution problem*

The remand record reinforces the Board's prior conclusion regarding rate structure. *Johnson* remanded the rate structure issue to afford "the Streaming Services . . . the opportunity to voice their objections to a completely uncapped total content cost prong." 969 F.3d at 383 (further adding that on remand, "the Streaming Services can present their concerns to the Board in the first instance"). The Board provided that opportunity to the Services in direct, rebuttal and supplemental rebuttal submission phases. And the Services *spectacularly* failed to proffer evidence warranting any change to the Board's findings on the issue. (*See* Section II.C, *infra*.) Equally glaring is the Services' failure to submit any evidence undermining the valid revenue diminution concerns of the Board underlying the universal true TCC prong. Given the Board's findings as to this evidence at the hearing, the Circuit's concurrence in the findings, and the utter absence of evidence on remand to impeach those findings, there is no record basis for the Judges to now substitute the Dissent's view for the Board's holding that the universal true TCC prong is necessary to counter revenue diminution and deliver reasonable rates. *LaShawn A. v. Barry*, 87 F.3d 1389, 1393 (D.C. Cir. 1996) (pursuant to the law-of-the-case doctrine, absent "extraordinary circumstances" such as clear error creating a "manifest injustice," then "the *same* issue presented a second time in the *same* case in the *same court* should lead to the *same result*") (emphasis in original); *Delgado v. DOJ*, 979 F.3d 550, 557 (7th Cir. 2020) ("The law-of-the-case doctrine

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and mismeasurement issues. (*See e.g.*, FD, Dissent at 60 (observing that "[t]he revenue deferral phenomenon indicates the need for Copyright Owners to protect themselves" and, in response, selecting "the 2012 benchmark in favor of Copyright Owners' or Apple's per-unit rate proposals"); *id.* at 68 (stating "the rate prongs in the 2012 benchmark that the Services are urging the Judges to adopt deal with these revenue measurement and attribution issues by the use of a greater-of rate structure, whereby – if the revenue-based royalty is lower than the other prong (typically a per-subscriber, a TCC prong or the Mechanical Floor) – then one of the latter prongs becomes applicable" and concluding that the 2012 benchmark's structure should be adopted); Services' Joint Reply to the Copyright Owners' Proposed Findings of Fact and Conclusions of Law at 25, eCRB Docket No. 14087, May 23, 2017 ("Services' Joint Reply to COF & COL") ("No party to this proceeding proposes a pure percentage-of-revenue rate.").) .

applies to judicial review of administrative decisions."). Instead, the remand evidence confirms that the Board's holding was correct. (Reply Remand Submission of Copyright Owners ("CO Reply Br."), Remand Written Rebuttal Testimony of Jeffrey A. Eisenach, PhD ¶¶ 66-69, eCRB Docket No. 25425, July 2, 2021) ("Eisenach RWRT")).

B. The true TCC is sound in principle

The Services cannot object to a true TCC prong *in principle* because every one of them proposed one in this proceeding for most offering types. (*See* CO Br. at 50-54; CO Reply Br. at 41-42.) In addition, [redacted]. (*See* CO Br. at 52-53, citing Leonard CWDT ¶ 64 (HX-695), Services' Joint Reply to COF & COL at Response to COF-466 ([redacted]), Response to COL-202 (same); HX-120 at p. 3; HX-121 at pp. 2-3; HX-122 at p. 3; HX-123 at pp. 3-4).) (*See also* Joint Submission, Opening Brief at 63, eCRB Nos. 23849-53, Apr. 1, 2021 ("Joint Br.") ([redacted]).)

Even on remand, the Services propose maintaining true TCC prongs. (Services' Joint Rate Proposal at 2-3.) They argue that this proposal is "fair and reasonable" and "satisfies the 801(b) factors." (Joint Br. at 19, 24-25, 30.) Having tied TCC prongs directly to label rates, they cannot, at the same time, claim it is "plainly unreasonable" to have a rate structure "[t]ying the mechanical rates directly to the [alleged] complementary oligopoly rates extracted by the labels." (*See id.* at 46; *see also*, *e.g.*, Services' Proposal For Remand Proceedings at 9, eCRB Docket No. 23383, Dec. 10, 2020 ("Services' Remand Proposal") (asserting that a true TCC prong "is, by definition, unreasonable").) The Services' demonstrably irreconcilable positions were exposed by Prof. Eisenach in the remand rebuttal submissions. While the Services pretended that the true TCC prongs *they proposed* were only for "certain less economically consequential offerings," (*see* Joint Br. at 59 n.25), Prof. Eisenach demonstrated that this supposed distinction was both flawed and patently false:

> In a representative month in 2020, a full [redacted] of the Services' aggregate declared service revenues came from offering types that would have true TCC rate prongs under all of the Services' proposals, and [redacted] of the mechanical royalties were generated by such offerings. (Eisenach RWRT §3A.) For Amazon, [redacted] of its declared service revenues came from these supposedly "less economically consequential" offerings. (*Id.*) For Google, [redacted] of its declared service revenues came from these offerings. (*Id.*) For Pandora, [redacted] of its declared service revenues came from these offerings. (*Id.*) For Spotify, [redacted] of its declared service revenues came from these offerings. (*Id.*) The Services cannot plausibly claim that these offerings—[redacted]—can be distinguished based on their inconsequence or insignificance.

(CO Reply Br. at 43; *see also* Eisenach RWRT ¶¶ 64-67 & Figure 18 & Table 1.)[13]

C. The true TCC is sound in practice

The remand record confirms that the true TCC is sound in practice as well. The Services convinced the Circuit to remand this proceeding to afford them the opportunity to present evidence of the supposed "economic harm" resulting from the adoption of a rate structure with a true TCC prong for all offerings, including so-called "runaway rates."[14] But we now know ***that there have***

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[13] The Services' "less economically consequential" argument is also completely at odds with other positions they have advanced. The Spotify offering that they now would have the Judges believe is "less economically consequential," its ad-supported offering (*see* Marx WDT ¶¶ 73, 81-85 (HX-1065)), is the same offering that its CFO testified had been [redacted] (*see* Tr. 2058:13-2060:2 (McCarthy).) It is the same offering that Spotify claimed was responsible for jump-starting the growth of the entire U.S. music industry. (*See* Spotify PFF & COL at SPFF11.) And Spotify claimed that because Copyright Owners' rate proposal allegedly would have jeopardized that offering, the Judges would have to reject Copyright Owners' proposal as incompatible with the 801(b) standard. (*Id.* at p. 3.)

[14] (*See, e.g.,* Final Public Reply Brief for Appellants/Intervenors Pandora Media, LLC, Google LLC, Spotify USA Inc. and Amazon.com Services LLC at 3, 10, ECF Doc. No. 1823617 (19-1028), Jan. 10, 2020; Transcript of Oral Argument 10:5-11:8 (claiming it was a "significant failure" of the Board not to allow the Services to introduce evidence about the true TCC prong's "impact"); *Johnson*, 969 F.3d 363 (19-1028).)

there been no "runaway" rates. There were no runaway rates during the three years under *Phonorecords III* rates and terms, and there have been no runaway rates during the *thirteen years* of true TCC prongs going back to *Phonorecords I.*

In fact, as Dr. Eisenach demonstrated in his remand rebuttal report, [redacted] since the record closed. (*See* Eisenach RWRT ¶¶ 6, 12-13 & Figure 1, 19-43 & Figures 2-10.) Indeed, some of the Services [redacted]. (*See id.* ¶ 21 & Figure 3 ([redacted]), ¶¶ 25-27 & Figure 5 ([redacted]), ¶ 34 & Figure 7 ([redacted]).) While the Services tried to obstruct discovery of these facts (necessitating a successful motion to compel), [redacted] were admitted by the Services' witnesses in remand testimony. (*See e.g.*, Supplemental Testimony of Rishi Mirchandani ¶ 20, eCRB Docket No. 23850,Apr. 1, 2021; Pandora's Written Direct Remand Submission, Written Direct Remand Testimony of George White ¶ 21, eCRB Docket No. 23853, Apr. 1, 2021; Spotify USA Inc.'s Written Direct Remand Submission, Written Direct Remand Testimony of Christopher Bonavia ¶¶ 14-19, eCRB Docket No. 23852, Apr. 1, 2021.) There is simply no basis to now impose a "cap" to retroactively "protect" the Services from a threat that we know never came to fruition.

In fact, because there was no real world evidence for their argument of economic harm caused by the lack of a "cap" on the TCC prong, the Services abandoned the argument on remand, first asking that the Board excuse them from having to put in any evidence on rate structure at all (Services' Remand Proposal at 6-7), and then conceding they had no evidence of harm or disruption. Indeed, they admitted there was no negative economic impact of the true TCC and were offering no such evidence. (*See* CO Reply Br. at 36-38 (citing Services' briefing and discovery responses making these admissions).)

In contrast to the Services' abandonment of any argument of economic harm, Copyright Owners demonstrated that there was no economic harm to the Services. That showing included expert analysis based on Spotify's public financial disclosures showing that, over the rate period, Spotify's profitability and revenues have improved (its revenues have grown by an average of 24.4% annually) and, as of mid-2021, it had $3.7 billion in cash and cash equivalents. (Eisenach RWRT ¶¶ 46-51 & Figures 11-12.) Pandora's revenues also grew over the rate period and its gross profit margins were stable. (*Id.* ¶¶ 52-54 & Figures 13-14.) [redacted], and the number of tracks available on the major streaming services all increased substantially over that period as well. (*Id.* ¶¶ 58-62 & Figures 15-17.) Additionally, Pandora's expert, Dr. Katz, admitted during his deposition on remand [redacted]. (*See* CO Reply Br. at Ex. Q, Deposition of Michael Katz (June 8, 2021) at Tr. 78:17-79:9, eCRB Docket No. 25424, July 2, 2021.)

In fact, as Dr. Eisenach's report demonstrated, the true TCC prong served its intended purpose over the nearly three years when the FD was in effect, by protecting Copyright Owners against revenue diminution and anomalous reporting. (*See* Eisenach RWRT ¶¶ 68-89.)

D. Eliminating the TCC Prong Would Unfairly Eliminate [redacted] in Mechanical Royalties

One cannot assess the impact of eliminating the TCC prong with any precision without knowing any details on the full rate structure, rates and terms (*see supra*, § I.C). Nonetheless, to provide a baseline for assessment, Dr. Eisenach analyzed historical royalty data to estimate the loss of royalty revenue from removing just the TCC prong from the rates and terms in the Final

Determination, leaving in place the mechanical floor. (Eisenach AWDT at ¶ 43.) He estimated a loss of nearly [redacted] in royalty revenue from eliminating the TCC prong for just the four Services (thus not including Apple or any other service). (*Id.*)

III. *Phonorecords II* per-subscriber rates do not remotely provide adequate protection against revenue diminution

A. The Mechanical Floor is far too low to provide adequate protection[15]

The WP contemplates eliminating the TCC and leaving just the percentage of revenue prong and the mechanical floor provisions "unchallenged on appeal in *Johnson* and previously agreed to by the parties in *Phonorecords II*,"[16] on the theory that those floors "mitigat[e] effects arising from a diminution of revenue under the percentage-of-revenue rate prong." (Dec. 9 Order at 4.) As discussed below, the mechanical floors were not proffered by the Services' as the antidote to revenue diminution. Rather, it was the TCC and correlated per-subscriber minimums. The mechanical floors had a wholly different purpose, and they are inadequate to protect Copyright Owners from revenue diminution.

First, the mechanical floors are not present in the *Phonorecords II* settlement for all the various service offerings and therefore do not provide any protection, for free, non-subscription ad-supported offerings, mixed service bundles, music bundles, locker services, or limited offerings. *See* 37 C.F.R §§ 385.13(a)(5), 385.22(b), 385.23(a)-(b) (2014). Rather, those offerings use an uncapped TCC to protect against revenue diminution. *Id.*; 37 C.F.R. § 385.13(c) (2014).

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[15] This subsection addresses, without limitation, issues raised in questions 1.b., 1.d., 3, 3.a., and 3.d.ii. of the Jan. 6 Order.

[16] Copyright Owners presume this means the mechanical floors *as they existed* in *Phonorecords II*, and not discounted in the case of family or student plans, as they were in the *Phonorecords III* determination, which discounted floors were *not* "unchallenged on appeal in *Johnson*" and were *not* "previously agreed to by the parties in *Phonorecords II*." (*See id.*) Of course, discounted floors offer even less protection from the Services' revenue diminution strategies than the already inadequate floors.

Second, the mechanical floors do not backstop a percent-of-revenue structure but were included to protect Copyright Owners against the risk of increased performance royalties reducing or eliminating mechanical royalties. Mechanical royalties are used to recoup songwriter advances (songwriter performance royalties, paid directly by the PROs and burdened by PRO fees, are unavailable for recoupment). This was acknowledged by the Services' witnesses. (Tr. 257:19-259:11; 260:8-261:3 (Levine) (conceding mechanical floors were included in *Phonorecords II* "to ensure that a certain percentage of the total publishing royalty was allocated to the mechanicals" in order to recoup advances); Tr. 693:18-694:-14 (Katz) (mechanical floors protect against performance royalties eating into mechanical royalties); *cf.* Proposed Findings of Fact of Copyright Owners at COF-640, eCRB Docket No. 3418, May 11, 2017 ("COF") (demonstrating that, under current publishing agreements, [redacted] (citing, *inter alia*, Brodsky WDT ¶¶ 27-29; Tr. 3197:14-3199:12 (Kokakis); Tr, 3730:5-16 (Israelite).)

Consistently, the Services' witnesses testified that it is "alternative minimum rates" or the "lesser of" rate prong—*i.e.*, the TCC rate prong (in some cases capped and in others uncapped, as in the *Phonorecords II* settlement)—that provide the protection in a percent-of-revenue structure against revenue deferral and displacement and ensure copyright owners a fair return. (*See, e.g.*, Tr. 1900–01 (Marx) (TCC of lesser of 21% of revenue and 80 cents per-subscriber "is what I think of as a backstop to the 10.5 percent of revenue"); Tr. 5581:13-5584:20 (Marx) (TCC prong plays "two roles"—protecting the Copyright Owners from "revenue mismeasurement" by creating the "greater of" prong, but incorporating the per-subscriber rate prong in the "lesser of" component to protect the services from "manipulation of the sound recording royalties"); Tr. 228:4-231:2, 231:24-233:21 (Levine) and HX-3272 (Response to Interrogatory No. 16) (the protection against revenue diminution, *e.g.*, pricing a service at one dollar, is the "lesser of" TCC prong).)[17]

Third, while the record shows that the purpose of the *Phonorecords II* mechanical floors was to protect against performance income eroding or eliminating mechanical income, the record is devoid of evidence as to how the penny rates were determined, why they are so low, or why there were different penny rates for different offerings (*e.g.*, a 50 cent floor for standalone portable subscriptions, mixed use; a 30 cent floor for standalone non-portable subscriptions, mixed use; a 25 cent floor for bundled subscription services; and a 15 cent floor for standalone non-portable subscriptions, streaming only.) *See* 37 C.F.R. § 385.13(a) (2014).[18] For example, [redacted]. (COF-439; Tr. 5990:23-5991:24 (Hubbard).) Nor did any of the Services' other expert or fact witnesses provide an answer. (*See* Copyright Owners' Reply to Services' Joint Proposed Findings of Fact and Conclusions of Law at JPFF125-CO Reply, eCRB Docket No. 12961, May 25, 2017; Tr. 688:24-694:14 (Katz).)[19]

Fourth, both the Board and Google acknowledged that the per-subscriber minima are an insufficient back stop against revenue deferral and displacement. Google amended its rate

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[17] Indeed, the proposals of certain of the Services, including Google, Spotify and Pandora sought to entirely eliminate the mechanical-only floors from the *Phonorecords II* structure, showing that those Services could not have viewed those floors as the protection against revenue mismeasurement.

[18] Indeed, there was no evidence in the record at all concerning several of these offerings, or the prices at which they are offered in the market.

[19] As Dr. Eisenach demonstrates, these inadequate mechanical floors do not provide protection against revenue diminution and the substantial reduction of royalties he calculates from eliminating the TCC prong.

proposal at the conclusion of the proceeding to include a universal uncapped TCC because the capped TCC was insufficient to protect against the Services' revenue deferral and displacement strategies. (Google Amended Rate Proposal at 1, Google PFF & COL at GPFF73 ("removing the caps allows the TCC to flexibly protect against downside risks associated with revenue deferral, displacement and attribution issues.").) Google did not amend its proposal to reinstate the mechanical floors from *Phonorecords II* that its original proposal had deleted because the mechanical floors were never a backstop to protect against these "downside risks." (*See* Written Direct Statement of Google Inc., eCRB Docket No. 13960, at Google's Proposed Terms at § 385.13(a).)

The Board adopted Google's amended proposed structure, finding it "superior," including because "an uncapped TCC prong effectively imports into the rate structure the protections that record companies have negotiated with services to avoid the undue diminution of revenue through the practice of revenue deferral," which they found "the Services do seek to engage [in] to some extent . . . . in order to promote their long-term growth strategy." (FD at 36.) If the per-subscriber minimums and mechanical floors had been viewed by the Board or the Dissent as adequate to protect against those acknowledged service strategies, there would have been no need for both the Board and the Dissent to implement a TCC *at all* (whether uncapped, as the Board found necessary, or partially capped, as the Dissent preferred).

Finally, the Jan. 6 Order suggests an alternate rate structure that relies "on a single percent-of-revenue prong." (Jan. 6 Order at 12 (question 1.c).) Copyright Owners presume this means a structure that would determine royalties based solely on a percentage of Service Provider Revenue, something that is in the Services' control and subject to their manipulation for their own ends (including to highly discount *or give away for free* the music service in order to sell other products or services).[20] Obviously, such a structure would be even *worse* than one backstopped by either or both a per-subscriber minimum and mechanical floors (where they exist), as the Services' experts recognized. (*See, e.g.,* COF-541-574; see also Tr. 5251:2-5260:10 (Leonard) (conceding that Copyright Owners' concerns with Google's rate proposal "might have more theoretical merit if directed against a rate proposal that was purely expressed as a percentage-of-revenue" and contrasting Google's proposal which included a TCC prong); Tr. 5583:1-22 (Marx) (conceding that Copyright Owners "would be much worse off" without the TCC prong "if there were revenue mis-measurement because then they would get only 10 and a half percent of mis-measured revenue"); *see also* Spotify PFF & COL at SPFF102.) And it would be directly contrary to the finding of the Board, not challenged or disturbed on appeal, that "[r]evenue deferral argues against adopting a pure percent-of-revenue rate structure." (FD at 36.)

B. Properly calibrated per-subscriber rates are an essential consideration in any alternate rate structure[21]

As noted above, the Services' experts uniformly admitted that a percent-of-revenue structure has deferment, displacement and mismeasurement problems that call for alternative rate prongs. They also acknowledged that any backstop to a revenue prong must be set at a proper level that "mimic[s]"or is calibrated to an appropriate percent of revenue amount. (Spotify PFF & COL at SPFF104-6; Tr. 1677:10-1679:11; 1996:23-1997:25 (Marx) (per-subscriber minimum "should be trying to mimic" the revenue percentage amount "so that if revenue is mis-measured, you are capturing 10 and a half percent of whatever the appropriate revenue would be"); Tr.

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[20] A rate structure that includes only a percentage-of-revenue rate means that if Amazon were to give away its premium Amazon Unlimited music service for free to encourage purchases of an Echo device, musical works rightsowners' royalties would be paid *nothing*.

[21] This subsection addresses, without limitation, issues raised in questions 1.a.-d., 3, 3.a., and 3.d.ii. of the Jan. 6 Order.

5582:13-5583:10 (Marx) (arguing 80 cents is a "back-stop relative to the 10 and a half percent of revenue"). But while the Services' experts agreed that the PSM must be calibrated to the percent of revenue rate, they were unable to honestly explain *how* the $0.80 cap in the *Phonorecords II* settlement was calibrated to the 10.5% revenue rate in that settlement. Prof. Katz conceded that he does not know where the 80 cents came from other than that he heard it had a correlation to the 10.5%. (Tr. 681:12-682:18 (Katz).) As Judge Feder recognized in his questioning of Dr. Marx, the 80 cents is *not* calibrated to the 10.5% revenue rate. Rather, at a $10 per month published retail price and a 10.5% revenue rate, a calibrated PSM would be $1.05. (Tr. 5578:8-5879:21 (Marx) ([redacted])).[22]

Thus, discussion of per-subscriber rates must reflect that, consistent with the testimony of the Services' experts, the rate should correspond to the determined rate percentage multiplied by the published retail price of the offering.[23]

This approach finds support in the [redacted] Unlike the

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[22] Dr. Marx tried to back into a justification for the 80 cent cap based on [redacted] but her proffered justification was demonstrably untrue. (Tr. 5578:8-5579:21 (Marx), 1677:10-1679:11 (Marx), 1900:7-1902:15 (Marx).) To begin with, Spotify neither existed [redacted] when the 80 cent cap was implemented (in 2008, in the *Phonorecords I* settlement). Moreover, [redacted] is not the same as industry ARPU, [redacted]. (COF-544, citing McCarthy WDT ¶¶ 50-51 (HX-1060); *see also* COF-541, citing Tr. 1739:19-1740:1 (Page); Page WDT ¶¶ 58; 60 (HX-1061). Regardless, Dr. Marx's *post hoc* theory of how the cap was derived is also nonsensical, [redacted] (Tr. 5579:16-17 (Marx).) To be clear, if a per-subscriber minimum is intended to, in Judge Strickler's words, "ameliorate" the problems of capturing all of the revenue attributable to music, especially with diversified companies, by backstopping the percent of revenue (Tr. 4236-4237:2), equating the per-subscriber minimum with discounted pricing rather than the published retail price ($9.99) only reinforces revenue diminution under a percent-of-revenue rate structure rather than providing any backstop. (Tr. 1960:23-1963:23 (Marx)).

[23] Of course, if the offering is not sold for a price, *e.g.*, a free ad-supported offering, then the TCC should be uncapped, as in the *Phonorecords II* settlement, and as the Services continued to propose on this remand. (Joint Rate Proposal at 2-3.)

unexplained and unsupported mechanical floors and TCC "caps" in the Phonorecords II settlement, [redacted][24]

In the context of the 15.1% revenue rate (as it should), discussion of an all-in per-subscriber rate would be at $1.51 (15.1% * the published retail price of $9.99). For all the reasons above, the Board cannot jettison the TCC rate. There must be a backstop against the Services' revenue diminution strategies, and, as shown above, the mechanical floors were not intended to and do not provide an adequate backstop. Likewise, the improperly calibrated 80-cent all-in per-subscriber cap eliminates the protection of the TCC prong.[25] Discussion of all-in per-subscriber rate can only begin with a rate calibrated using a proper percent of revenue and price.[26]

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[24] [redacted] (Eisenach WDT ¶ 28.)

[25] [redacted] (Google PFF & COL at GPFF47; *see also* Joint Br. at 63 n.28 ("Under the prior structure . . . the Services could always conservatively assume that the TCC prong would reach the cap. Under the Majority's rate structure, the Services are required to calculate TCC in order to determine whether the TCC prong or the percentage-of-revenue prong will bind.").) This is not what was anticipated when the *Phonorecords I* and *II* settlements were negotiated; rather, the assumption was that any of the three tiers could bind depending on how the business developed. (Tr. 3636:16-3638:2 (Israelite).)

[26] While, as discussed above (at Sec. III.A., *supra*), the mechanical floors were not intended and are not adequate to protect against revenue diminution, if the Board, in violation of *Johnson,* is going to reopen the entirety of the rate structure, including those portions that were not appealed and are not subject to the remand and mandate, those floors should also be calibrated to the percent of revenue rates and therefore increased. As Dr. Eisenach testified, [redacted]

IV. The Working Proposal, after a necessary correction, confirms that the revenue rate should rise substantially[27]

Both Prof. Watt and Dr. Eisenach discuss in detail the formula in the WP, and its relation to the Shapley analyses and the rate derivation methodology in the Final Determination. (Watt AWDT ¶¶ 28-40; Eisenach AWDT ¶¶ 9-22.) Copyright Owners do not reiterate their analyses here, but provide citations thereto.

A. The Working Proposal formula is the same as the Final Determination formula, when adjusted to use the affirmed Shapley ratio

The WP formula is mathematically the same as the Final Determination formula to derive the revenue rate, but utilizes a ratio that did not come from the Board's Shapley analysis. (Watt AWDT ¶¶ 28-33; Eisenach AWDT ¶ 20-22.)

Instead, the WP takes the adjusted TCC rate (26.2%), and proposes using its ratio (3.82:1) as an input to derive the revenue rate. As Prof. Watt and Dr. Eisenach explain, this substitution would manufacture an improper reduction in the revenue rate. (Watt AWDT ¶¶ 34-40; Eisenach AWDT ¶¶ 19-21.) The Board determined from Shapley analysis that the proper ratio for determining musical work royalties from combined royalties was 2.5:1, a methodology that produced a percent of revenue of 15.1% and was affirmed in detail by *Johnson*. (*See supra*, § I.B)

Even the AMOs themselves acknowledge that the proper ratio to use is the one from the Shapley analysis in the Final Determination:

> [I]n the Working Proposal, the Judges indicated their interest in potentially identifying from the existing record an appropriate percentage of revenue that these complementary oligopolists allow the Services to retain, and then **applying the**

[redacted] (Eisenach RWRT at Appendix C.) Based on the all-in revenue rate of 15.1% or $1.51 per user, a properly calibrated mechanical-only floor would be roughly $[redacted]. Were the 80 cents used as a base and increased to $1.15, the 50 cent mechanical only floor is 5/8 of 80 cents and hence the 50 cent mechanical only floor should be 5/8 of $1.15 or 71.875 cents (or 72 cents).

[27] This subsection addresses, without limitation, issues raised in questions 1.a.-1.b., 3, and 3.d. of the Jan. 6 Order.

> **same percentages that the Majority utilized in the Phonorecords III Determination**. Simply put, **the Judges have not indicated a willingness to revisit the Shapley Value proportions**, but rather to apply them in a formula that is based on the record and that reflects the actual workings of the market. (Jan. 6 Order at 6.)

The "Shapley Value proportions" that Judges have not indicated a willingness to revisit is the 2.5:1 ratio that *Johnson* affirmed, holding it was the "type of line-drawing and reasoned weighing of the evidence falls squarely within the Board's wheelhouse as an expert administrative agency." *Johnson*, 969 F.3d at 386.

B. The corrected Working Proposal delivers increased revenue and adjusted TCC rates

Prof . Watt and Dr. Eisenach each identify evidence in the record of appropriate combined royalty rates. Prof. Watt outline the results of his Shapley analyses, as well as the results of the robust Shapley analysis provided by Prof. Gans on rebuttal, which deliver combined royalty rates ranging from [redacted] percent to [redacted] percent. (Watt AWDT ¶¶ 41-44.) These ranges, applying the 2.5:1 ratio, deliver percent of revenue royalty rates from 18.3% to 24.2%.

Dr. Eisenach lays out benchmark combined royalty rates in the record, beginning with the actual combined royalty rates in the marketplace. (Eisenach AWDT ¶¶ 23-34.) Market rates are suitable benchmarks, and as discussed in the next section, there is no economic basis in the current marketplace for ratesetting *reductions* to market royalties based upon complementary oligopoly theory. Dr. Eisenach looks at specific service examples and broad industry examples for benchmarks, identifying a range from [redacted] percent to [redacted] percent, which delivers revenue rates between [redacted]% and [redacted]%. *Id.* Dr. Eisenach also discusses several reasons to favor higher rates, including downward effects that are endogenous to this proceeding, as well as increased revenue diminution. *Id.* at 31.

Importantly, the adjusted TCC rate increases alongside the modeled combined royalty rate (as there is less adjustment discount when the modeled combined rate approached the market combined rate). (Watt AWDT ¶ 39.) The "Gans" row in the table on page 73 of the Final Determination outlines the adjusted TCC rate at various combined royalty rates.

C. There is no economic basis to reduce royalty rates based upon on record company "complementary oligopoly" theories[28]

Prof. Spulber, Prof. Watt and Dr. Eisenach all address the Judges' question concerning how "complementary oligopoly power" should or should not affect the Judges' consideration of the rates and rate structure. Prof. Spulber resubmits his analysis of this question from his remand rebuttal report (which was struck by the Judges as not being rebuttal), which provides sophisticated analysis from a foremost scholar on Cournot's theories, laying out numerous reasons why his theory is not applicable in this market. (Spulber AWDT.) Prof. Watt also discusses the Cournot model, explaining that it is a mathematical proof that requires specific assumptions which do not apply in this market, as well as discussing issues of record company price competition and the general economic significance of necessity in joint enterprises. (Watt AWDT ¶¶ 50-57.) Dr. Eisenach discusses the different frameworks between the complementary oligopoly theory and the bargaining market for sound recording licenses, and the existence of effective competition. (Eisenach AWDT ¶¶ 35-37.)

Beyond these expert analyses, other record evidence belies a theory that Major record companies are a complementary oligopoly. Perhaps most conclusive on this issue is that [redacted]. (*See* Copyright Owners Proposed Conclusions of Law at COL-251 to 254 and record

[28] This subsection addresses, without limitation, issues raised in question 3.d.i. of the Jan. 6 Order.

cites therein.) There has never been an argument that small and independent record companies wield complementary oligopoly power, and thus no argument that their rates incorporate any complementary oligopoly power. As the Board noted in a like context in *Web V*, this should be generally confirmatory that the Majors' licenses also do not incorporate complementary oligopoly power.[29]

V. <u>**The Working Proposal may not be consistent with the 801(b) standards**</u>[30]

The Jan. 6 Order (at 14) directs the participants, at Question 4, to address how "incorporation of the Working Proposal [would] meet, or fail to meet, the four objectives set forth in 17 U.S.C. § 801(b)(1)[.]" A definitive response to this question is not possible, because the WP does not specify a particular rate structure that the Judges intend to adopt. (*See* Jan. 6 Order at 11 (stating the rate structure is "to be determined"), 12-14 (asking for responses as to a variety of structures)), nor an exact rate level (*see id.* at 9-11 (describing calculations yielding revenue rates ranging from [redacted]% to [redacted]%).)[31] Consistent with *Johnson,* to meaningfully respond to any novel rates that the Board derives, participants must understand the Board's rate structure "combined with" the level of its rate increase, *Johnson*, 969 F.3d at 381, and assessment of the 801(b)(1) factors is "intertwined with," among other things, "the nature of the rate structure [that is]

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[29] *See Web V Initial Determination*, Docket No. 19-CRB-0005-WR (2021-2025) (June 11, 2021) at 63 (noting expert witness identification of "two [redacted] royalty rates as simultaneously satisfying and not satisfying the effective competition requirement (inconsistent with the principle of transitivity)," and finding that "[redacted] is generally confirmatory of" [redacted]). This [redacted] is particularly notable since there is a reason to expect Majors to get higher rates in an effectively competitive market. *See Web IV Final Determination*, 81 FR at 26373 ("each Major may well be entitled by its firm-specific market power to higher rates than the Indies").

[30] This subsection addresses, without limitation, issues raised in question 4 of the Jan. 6 Order.

[31] As noted above and in the accompanying statements of Dr. Eisenach and Dr. Watt, these percentages are the product of a fundamental error in the AMO that is in violation of *Johnson*.

ultimately imposed by the Board," *id.* at 389. For example, as discussed in Section IV, *supra*, the WP formula, after correction to apply the affirmed 2.5:1 ratio, delivers higher rate percentages than those predicted in the AMO. Accordingly, Copyright Owners respond herein with a discussion of general principles and guideposts to assist the Judges in reaching their determination.

To be consistent with *Johnson,* to satisfy Factor A, the WP must produce higher royalty rates to "ensure the continued viability of songwriting as a profession." *See Johnson*, 969 F.3d at 387-88 (*quoting* FD at 85).[32] The Dec. 9 Order confuses or alters the ratio input from the 2.5:1 that the Circuit affirmed, producing improperly low royalty rates. Correcting for this error in the WP, its core premise—that the 53% combined royalty figure is too low—confirms that rate levels must increase materially over the *Phonorecords II* levels, consistent with Factor A and *Johnson.*

The WP, if not corrected, is not consistent with Factors B and C. For Factor B (fair return and fair income) and Factor C (relative roles of the copyright owner and user), the Majority and the Dissent both found (and the parties' experts agreed)[33] that Shapley analyses addressed those factors. FD at 85-87, Dissent at 146. The Board's Factors B and C analysis, accordingly, incorporated the same Shapley-based analysis that the Board had used when determining rate percentages, *id.* at 85-87, which as noted, the Circuit affirmed, *Johnson,* 969 F.3d at 384-86, including the use of Prof. Gans's 2.5:1 ratio in arriving at the 15.1% revenue rate, *see supra* at Section I.B. Were the Board to use the incorrect 3.82:1 ratio (instead of the 2.5:1 ratio derived

[32] The Circuit similarly affirmed the Majority's findings that there was "ample, uncontroverted testimony that songwriters have seen a marked decline in mechanical royalty income over the past two decades"; that it has been "increasingly difficult for non-performing songwriters . . . to earn a living practicing their craft"; that "this decline has led to fewer songwriters"; and that if "this trend continues, the availability of quality songs will inevitably decrease." *Id.* at 388 (*quoting* FD at 83).

[33] *See* 84 Fed. Reg. at 1958-59 (citing testimony by Dr. Marx, Dr. Watt, and Dr. Gans); *see also*, *e.g.*, Marx WDT ¶ 12 (HX-1065); eCRB Docket No. 23852, Written Direct Remand Testimony of Leslie M. Marx ¶ 52.

from the Shapley-related methodology and calculations the Circuit affirmed) to arrive at a rate lower than the 15.1% determined from that ratio, because it would be inconsistent with the affirmed Shapley methodology and rate determination derived therefrom that did satisfy Factors B and C, it could not and would not satisfy Factors B and C.

As to Factor D (disruption), as noted above, the Services expressly disavowed any claim that the FD rate structure was disruptive or even that it had any negative financial impact on their businesses. (*See* CO Reply Br. at 36-38 (citing Services' briefing and discovery responses).) They had no choice given that the Services' [redacted] (*see* Eisenach RWRT ¶¶ 6, 12-13 & Figure 1, 19-43 & Figures 2-10), and that the Services have been thriving financially and [redacted] during this the rate period, including when the FD's rates were in place (*see id.* ¶¶ 46-62 & Figures 11-17). On the other hand, since *Johnson* has held that, absent an increase in rates, the "viability of songwriting" in America will be threatened, there necessarily will be disruption without an increase in mechanical royalty rates and payments.

As the Services' experts admit, without structural protections that prevent revenue diminution, merely increasing rates will not establish "reasonable rates and terms" under 801(b)(1). To take one real-world example, [redacted], because Spotify is engaged in massive price discounting [redacted]. (Eisenach RWRT ¶¶ 81-83 & Table 3.) Indeed, if the Judges were to adopt a revenue rate without including robust alternative rate prongs, mechanical royalties could plummet or drop to zero if, for example, the Services decided to operate a free offering with limited or no advertising.

VI. The Board Can and Should Take New Agency Action to Again Implement the Adopted Bundle Revenue Definition[34]

A. The Judges May Implement The Adopted Bundle Revenue Definition[35] In A New Determination Issued After This Remand Proceeding, Which Will Constitute A New Agency Action

The Judges requested "the parties' views on whether this proceeding constitutes the type of new agency action addressed by the D.C. Circuit, which would allow adoption of a Service Revenue definition without limitation to the definition addressed in the Initial Determination." (Dec. 9. Order at 4.) The D.C. Circuit, consistent with *DHS v. Regents of the Univ. of Ca.*, 140 S. Ct. 1891, 1908 (2020), and citing it as authority, remanded the issue of the Board's adoption of a revised definition of "service revenue" for bundled offerings "for the Board *either* to provide 'a fuller explanation of the agency's reasoning at the time of the agency action,' *or* to take 'new agency action' accompanied by the appropriate procedures." *Johnson*, 969 F.3d at 381-82. The Dec. 9 Order correctly recognizes that these are two "*alternative* directive[s] for addressing the Service Revenue definition." (Dec.9 Order at 4). *See Regents,* 140 S. Ct. at 1907-08; *see also Lewis v. U.S. Army Corps of Engineers*, No. 18-1838, 2021 WL 1401756, at *2 (E.D. La. April 14, 2021) ("When a court remands a matter to an agency because the agency's proffered grounds

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[34] This section responds to the Judges' requests in the AMOs for "additional briefing on the D.C. Circuit's second alternative directive for addressing the Service Revenue definition, namely, that the Judges take 'new agency action' accompanied by appropriate procedures." (Dec. 9 Order at 4.) This section supplements Copyright Owners' briefing on these issues at CO Br. at Sec. III and CO Reply Br. at Sec. III.

[35] As in the Copyright Owners' prior briefs submitted in this remand proceeding, the "adopted bundle revenue definition" means the definition of service revenue adopted by the Board in FD, Regulatory Terms at 8, and the "prior bundle revenue definition" means the definition of service revenue in the Initial Determination, eCRB Docket No. 2288 (Mar. 19, 2018), which was inadvertently carried over from the *Phonorecords II* regulations.

for its action are inadequate, the agency on remand may either 'offer a fuller explanation of [its] reasoning at the time of the agency action or, *[a]lternatively*, the agency *can deal with the problem afresh* by taking new agency action.'"), and additional cases discussed, *infra.*

"The Services concede that this Remand *allows* the Judges to engage in new agency action" on this issue. (Jan. 6 Order at n. 10, citing Services' Joint Opposition to Copyright Owners' Motion for Reconsideration or Clarification at 22.) Despite this concession, they focus almost exclusively on the first alternative, *i*.e. "the statutory paths for modifying a Determination, [paying] relatively little attention to the FD having been vacated and remanded or whether and how this remand may qualify as 'new agency action.'" (Jan. 6 Order at n.10.)

The Services argued that if the Board were to adopt any service revenue definition other than that which pre-existed and [redacted], it had to show that its definitional change at the time it was made, *i.e.*, between the time of the Initial and Final Determination, met the standards to make a correction under Section 803(c) of the Copyright Act. (Joint Br. at 64-68.) They argued that the Board cannot do so because the correction, at the time it was made, did not satisfy either Section 803(c)(2)(A) (revision after rehearing) or Section 803(c)(4) (revision to correct technical or clerical errors or "in response to unforeseen circumstances that would frustrate the proper implementation of [the] determination"). (*Id.*)

Ignoring that it was *their burden* to provide evidence supporting the prior definition and its reasonableness, the Services argued that the prior definition must be maintained because it is purportedly too "late in the game" for the Board to adopt any definition other than the prior one. (*Id.* at 64.) They argued that offering new reasons justifying the adoption of a new bundle revenue definition would be impermissible "*post hoc*" justification under *Regents*. (*Id.* at 66.) They thus concluded that, "[w]hile the D.C. Circuit offered the Judges another opportunity to identify legal authority for its action, . . . none exists," and so the only possible outcome is to retain the prior bundle revenue definition. (*Id.* at 65; *see also* Services' Joint Reply Brief at 52, eCRB Docket No. 25426, July 2, 2021 ("Joint Reply").)

To create this non-existent legal *cul de sac*, the Services ignored (or, in the Judges' parlance, paid "relatively little attention to") the new agency action path expressly allowed by *Johnson*.[36] A "new agency action" is any agency action that "deal[s] with the problem afresh," and an agency that takes this route is no longer limited by its prior reasoning so long as it complies with the procedural requirements for new agency action. *Regents*, 140 S. Ct. at 1908.

Cases following *Regents* make clear that a new determination on the bundle revenue definition issued by the Board at the close of this remand proceeding, after reviewing the parties' submissions and the existing record evidence cited therein, will constitute a "new agency action," provided it deals with the relevant issue "afresh," and sets forth its reasons for adopting its chosen definition.

In *Fisher v. Pension Benefit Guaranty Corp.*, 994 F.3d 664, 670 (D.C. Cir. 2021), *reh'g en banc*, 2021 U.S. App. LEXIS 18793 (D.C. Cir. June 23, 2021), for example, the agency ("PBGC") issued a 2011 denial of appellant's request for lumpsum payment of his pension benefits. After the denial was vacated and remanded by the court, PBGC's 2016 remand decision denied the same request but with a new rationale. Appellant argued that the 2016 decision was not a new agency action, and so its reliance on a new rationale not mentioned in the 2011 decision constituted an impermissible *post hoc* rationalization. *Id.* at 669. The D.C. Circuit rejected this argument, holding that the agency was entitled to and had chosen the second of the two paths—new agency

[36] An "agency action" includes any agency order, rule, relief, or other performance of a "function delegated to it by Congress." *SEC v. Chenery Corp.*, 332 U.S. 194, 201 (1947); *see also* 5 U.S.C. § 551(13).

action, rather than fuller explanation of the agency's reasoning at the time of the 2011 decision. *Id.* at 670. While the 2016 remand decision modified the 2011 decision by "more fully responding" and "providing a revised and more complete explanation," its "substance made clear that it was a new agency action," it "was styled as a final agency action," and it "did not purport to justify a predetermined outcome." *Id.* *Rather*, it "reexamined the administrative record and dealt with appellant's appeal 'afresh.'" *Id.*

Similarly, in *Friends of the River*, 2020 WL 6391314, the National Marine Fisheries Service ("NMFS") issued a determination (referred to as a "BiOp") that activities of the Army Corp. of Engineers were not likely to jeopardize the survival of certain endangered fish species. The Ninth Circuit found that the BiOp was arbitrary and capricious. *Id.* NMFS argued that, on remand, it could comply with the Ninth Circuit's decision by taking new agency action, in this case, issuing a new BiOp. *Id.* at *2. Intervenor Defendants argued that the Circuit decision limited the agency to providing a "fuller explanation" of its prior determination. *Id.* The district court agreed with NMFS, finding that the Circuit indicated that the NMFS "may also choose to change its approach by adopting a new BiOp." *Id.*, citing *Regents*. *See also Black Warrior Riverkeeper, Inc. v. EPA*, No. 2:19-cv-00344-JHE, 2021 WL 927260, at *6 (N.D. Ala. Mar. 11, 2021) (EPA's 2018 decision approving state agency's 2018 delisting of two waterbodies subject to pollution control measures was separate from its 2020 decision to continue to delist those waterbodies; the 2020 decision was a new agency action supported by a separate explanation); *Lewis,* 2021 WL 1401756, at *2 (issuance of new determination on remand that plaintiff's land was "wetlands" was new agency action that complied with court's mandate).

The Services' arguments (Joint Br. at III.A; Joint Reply at IV.A)—including that when taking the new agency action path the Judges may consider only "new reasons for (or against) the conclusion" that they had the authority under Section 803(c) to change the definition at the time of the change (Joint Br. at 54) —conflate the standards for the two paths: only the Board's reasoning *at the time of the FD* (the prior agency action) would have to satisfy 803(c), not new agency action. The Supreme Court made that distinction crystal clear in *Regents*: "When an agency's initial explanation indicate[s] the determinative reason for the final action taken, the agency may elaborate later on that reason (or reasons) but may not provide new ones." But if the agency chooses to "deal with the problem afresh by taking *new* agency action," it "*is not limited to its prior reasons*" that it invoked when taking the original action. *Regents,* 140 S. Ct. at 1908. *See also Fisher*, 994 F.3d at 669 (same); *Lewis*, 2012 WL 1401756, at *2 (same). Thus, if the Board chooses to provide "a fuller explanation of [its] reasoning at the time of" its Order Granting in Part and Denying in Part Motions for Rehearing (eCRB Docket No. 3603, Jan. 4, 2019 ("Rehearing Order")) and the FD for its authority to modify the prior bundle revenue definition *at that time*, it cannot offer a different explanation as to *that* authority. But if it takes new agency action, it need not provide *any* explanation concerning its authority to modify the definition at the time of the Rehearing Order or the FD (under 803(c) or otherwise). It need only justify its new action with evidence.

Indeed, at this stage, 803(c) is completely irrelevant. The Initial Determination was modified by the FD, and the FD as to this issue was vacated. This is not a rehearing but a remand (and thus need not satisfy 803(c)'s "exceptional cases" standard). A determination of the issue on remand is not the correction of a technical or clerical error as to the remanded issue nor is it a modification of a term in that decision in response to unforeseen circumstances (and thus does not need to satisfy the "in response to unforeseen circumstances" standard). A remand is governed by 803(d)(3), which states only that proceedings on remand must be in accordance with 17 U.S.C. §

803(a). Section 803(a) contains none of the procedures that the Services claim are "too late in the game" for the Board to follow.[37] Moreover, the parties in this remand were afforded the opportunity for further briefing and, if they wished, to submit additional evidence on this issue, thus providing broader opportunity for submission than *Fisher,* 994 F.3d at 670, where the D.C. Circuit upheld new agency action after remand even though the agency did not provide appellant the opportunity to submit new briefing or exhibits, because the appellant acknowledged that "the factual record before the [agency] was fully developed."

The Services' argument that the prior bundle revenue definition is immutable because the Board made an alleged procedural error in modifying it between the time of the Initial and Final Determination without satisfying the standards for rehearing or correction is legally and logically baseless and contrary to the Circuit's remand. If the Board can only reinstate the prior bundle revenue definition (regardless of whether it has evidentiary support or is inconsistent with prior Board precedent and economic principles), then the Circuit would not have remanded the issue but would simply have reversed and reinstated the Initial Determination definition. Like the plaintiff in *Bean Dredging,* a case that the Services themselves cite (Joint Reply at 52), the Services

> fail[] to acknowledge the logical conclusion of [their] argument. Were [their] position to prevail, the mechanism of remand would be without purpose; once an agency made some error or strayed in some material respect, its action would be irredeemable. Clearly, this is not the law. Courts frequently remand matters to agencies while leaving open the possibility that the agencies can reach exactly the same result so long as they rely on the correct view of the law that they previously

[37] The procedures in 803(a)—which include presiding over hearings en banc, reaching a final determination by majority vote, and rendering a decision on the basis of a written record and that is not inconsistent with prior Board precedent—can be satisfied by the Board in taking new agency action by issuing a determination on this remand. The D.C. Circuit recognized in *Intercollegiate Broadcast Systems, Inc. v. Copyright Royalty Board*, that "neither the Copyright Act nor the Board's regulations prescribe any particular procedures on remand." 796 F.3d 111, 125 (D.C. Cir. 2015) (citing 17 U.S.C. § 803(a), (d)(3)). "The relevant regulation provides only that, '[i]n the event of a remand... the parties to the proceeding shall ... file with the Judges written proposals for the conduct and schedule of the resolution of the remand." *Id.* (quoting 37 C.F.R. § 351.15).

> misinterpreted, or as long as they explain themselves better or develop better evidence for their position.

Bean Dredging, LLC v. United States, 773 F. Supp. 2d 63, 79 (D.D.C. 2011).

There is also no risk of "post hoc rationalization" here, *Regents*, 140 S. Ct. at 1908, even under the "new agency action" path. The Board in the Rehearing Order and the FD rejected the prior bundle revenue definition because the Services bore the burden to "provide evidence of how they price bundles and value the component parts thereof," but failed to do so, thus failing to mitigate the "economic indeterminacy problem inherent in bundling." (Rehearing Order at 17-18.) The Board can in a new final determination—*i.e.*, a new agency action—again reject the Services' definition on these same grounds or on any other grounds, and that would not at all be inconsistent with the reasons previously given.[38] And while the Board stated that the Copyright Owners also "did not present evidence to support a different measure of bundled revenue because their rate proposal was not revenue-based," that does not mean that there was no evidence in the record supporting the adopted bundle revenue definition, and the Copyright Owners on this remand have identified the overwhelming evidence in the record. (*See* CO Br. III.B; CO Reply III.C; Section VII.C, *infra*.)[39] The Board is not "stuck" with the unreasonable and unsupported prior bundle revenue definition it rejected, as the Services strain to argue.

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[38] An agency may always reach the same conclusions it reached prior to a vacatur and remand, provided its actions are procedurally proper, and provided there are no directions contrary from the appellate court. (CO Br. at 73-74, citing authorities.) *Johnson* contains no contrary directions.

[39] Nor is there any risk of inconsistency between new agency action and any substantive finding in *Johnson*. The Circuit did not find any substantive error in the changed definition of service revenue. It remanded only because it found the Board had not provided an adequate explanation of the procedural authority under which it had revised the definition *at the time of the agency action* that was before it—*i.e.*, between issuing the Initial and Final Determinations. While the Services argued that the adopted bundle revenue definition lacked substantial evidence to support it, the Circuit did not accept that argument. *Johnson*, 969 F.3d at 389-92.

Most of the cases cited by the Services (Joint Reply at 52-54), do not involve new agency action, and those that do—*Regents*, *Fisher*, and *Bean Dredging*—*support* the Copyright Owners' arguments. In *Fisher*, as noted above, the D.C. Circuit upheld new agency action when, on remand, the agency issued a new determination that "reexamined the administrative record and dealt with appellant's appeal 'afresh.'" *Fisher*, 994 F.3d at 670. In *Bean Dredging*, the agency (the "NPFC") denied Bean Dredging's ("BD") claim for reimbursement in connection with an oil spill on the ground that BD had caused the spill by violating certain safety regulations, rejecting BD's interpretation of the term "seas" in the regulations. The D.C. Circuit remanded to the NPFC to provide a "further explanation of its interpretation of the term 'seas,' as it is used in [the applicable regulations], and its reasons for rejecting the interpretation advanced by" BD. 773 F. Supp. 2d at 78. On remand, the NPFC adopted in large part the interpretation of the term "seas" proffered by BD, but nevertheless reached the same conclusion, on the existing record, that BD had violated the applicable regulation. The Circuit affirmed the agency action, finding that its reliance on the existing record, while "revisit[ing] the legal contours" of the prior decision while "expand[ing] upon its reasoning" was consistent with its remand order and "not an abuse of discretion." *Id.* Moreover, while the Services' cite *Bean Dredging* for the unremarkable proposition that "an agency's review on remand must be responsive to the court's mandate" (Joint Reply at 52), they ignore that taking a new agency action that the court's mandate *expressly states can be taken*, as here, is certainly responsive to that mandate.[40]

[40] The only other case cited by the Services involving new agency action, *Ali v. Pompeo*, No. 16-CV-3691-SJB, 2020 WL 6435834 (E.D.N.Y. Nov. 2, 2020) does not, as the Services contend, require the Board in a new agency action to address the basis of its legal authority for a change made to a now-vacated determination at the time of that determination. In *Ali,* the State Department revoked the petitioner's passport based solely on petitioner's sworn statement, which, the petitioner later claimed had been coerced. On appeal, the District Court found the State Department's determination to be arbitrary and capricious because it ignored the petitioner's argument that the statement was coerced. *Id.* at *5. It determined that the petitioner was entitled to a hearing that considered his

The Services' *cul de sac* argument is not only contrary to law but it is also utterly cynical because the Services make directly contrary arguments in their own favor. For example, pretending that the Circuit reversed the entirety of the FD (except apparently the family and student discounts), the Services disregard that the Circuit specifically affirmed the Board's finding that the *Phonorecords II* rates were too low, and proffer a new and even lower rate proposal, one that includes many other significant changes to the regulations adopted in both the Initial and Final Determinations, including regulations concerning issues that are beyond the scope of the remand and as to which the record was not been reopened. This includes proposals to expand the application of discounts for family plans and student plans.

The Services are conspicuously silent about how the Board can modify regulations annexed to the Initial and Final Determinations that would change parts of the FD that *were not remanded* (or even appealed) while the Board is supposedly barred from taking new agency action to address a regulation that the Circuit *expressly remanded for the Board to take new agency action*.

B. The Prior Bundle Revenue Definition Was Demonstrated By Overwhelming Record Evidence and Legal Precedent to be Manifestly Unreasonable

Under the prior bundle revenue definition, Service Provider Revenue for royalty purposes was calculated by starting with the total revenues from the bundle and subtracting "the standalone published price" for each of the *non*-music components of the bundles. The Services failed at the hearing and on remand to support the prior bundle revenue definition with any evidence, including

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argument and remanded the case back to the State Department. Six days later, and without conducting a hearing as directed by the Court, the State Department issued a new determination stating that it was revoking the petitioner's passport on new grounds, which grounds were also predicated on petitioner's statement that he had claimed was coerced, thus completely ignoring the very issue that the District Court *had expressly directed* the agency to consider. *Id.* Here, *Johnson* contained no direction to the Board as to the evidence or arguments it need consider in taking new agency action on this issue.

"evidence of how they price bundles and value the component parts" and that "concern[s] the proper economic allocation of bundled revenue" (CO Br. at 82, quoting Jan. 2019 Order at 18), and thus "might mitigate the acknowledged 'economic indeterminacy' problem inherent in bundling" in a manner consistent with Board precedent. (*Id.* at 78-80; CO Reply Br. at 72-73, citing and quoting, *inter alia*, Rehearing Order at 16-18; *SDARS III*, 83 Fed. Reg. at 65264; Ruling on Regulatory Interpretation Referred by United States District Court for District of Columbia, No, 2006-1 CRB DSTRA (2007-12) (Jan. 10. 2007, pp. 19-22 & n. 36, available at https://www.crb.gov/rate/2006-1-crb-dstra/ruling/1-10-17-ruling-and-memorandum.pdf.).) The economic indeterminacy problem is, as the Services' own experts explained, the "revenue measurement issues [that] arise when a streaming service is sold as a part of a larger bundle of services," which makes allocating revenue across the bundled services "[redacted]" (Hubbard) or at least "contentious" (Katz) or "particularly challenging" (Ghose). (CO Br. at 75-76, citing testimony of Services' experts).

It was the Services' burden to present such evidence, as it "would be in [their] possession, not in the possession of" Copyright Owners. (*See id.*, quoting *SDARS III*, Rehearing Order at 18.) But the Services *conceded* that they offered no evidence concerning the separate values of the constituent parts of the bundles that they offer or wish to offer, or any other evidence concerning the economic allocation of bundled revenue. (Joint Br. at 76 (admitting Services did not submit any "evidence specifically addressing the way that customers, Services, or copyright owners might 'value the component parts' of bundles").)[41] The Services' failure to adduce such evidence means

[41] While the Services repeatedly made the conclusory assertion that that there is "ample support for the *Phonorecords II* approach to bundles in the record" (Joint Br. at 76), there is in fact *no* support for the approach in the record. The only evidence the Services cited supports, at most, the alleged benefits of the *practice or strategy of bundling*. (*See, e.g.,* Joint Br. at 70-74.) But the business benefits to the Services of *bundling* covered music services with other products or services remain available under the adopted bundle revenue definition. Whether or not bundles capture

that the Judges may adopt a Service Provider Revenue definition that makes *all* bundle revenue subject to the royalty obligation. (CO Br. at 81-82; CO Reply Br. at 87-88.) They may also again adopt the adopted bundle revenue definition which, as shown in Section VII.C below, is well supported by the record evidence and cures the economic indeterminacy problem.

In fact, the evidence showed that, in practice, the prior bundle revenue definition *exacerbated* the economic indeterminacy problem. The definition—which Spotify referred to as a "loophole" (CO Br. at 77, citing Spotify PFF & COL at SPFF 138)—[redacted] (*Id.* at 82-90, citing evidence; Tr. 1481:24-1484:18 (Mirchandani).) [redacted] (*Id.*)[42] This

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low willingness-to-pay consumers or foster beneficial price discrimination is unaffected by how bundle revenue is defined. The choice is not between bundles with the Services' definition or no bundles; the choice is whether to have a definition that permits the licensee to [redacted] or instead one that requires the licensee to ascribe a fair value to music. (*See* CO Reply at 80-82.) In fact, the Board already considered the Services' price discrimination arguments in the context of the bundle revenue definition, and found that, as compared to the alternative of including the entire price of the bundle in the revenue base, the adopted bundle revenue definition "better accommodates beneficial price discrimination by services, which increases access to music services by customers with low willingness to pay." (Rehearing Order at 17-18.)

The Services also argued that the prior bundle revenue definition should be adopted merely because it was present in *Phonorecords II.* (Joint Br. at 69.) But the Services cited no evidence concerning the negotiation of the *Phonorecords II* bundling definition, or what the parties intended at that time when there was no bundling in the marketplace. (CO Br. at 81 n.37.) Moreover, the Board previously rejected the Services' argument that it should accept the prior bundling revenue definition because it was present in the *Phonorecords II* settlement. (Rehearing Order at 17-18 (declining to "rely on the 2012 Settlement as a benchmark, as the basis for the rate structure, or, therefore, as regulatory guidance").)

[42] It did so not in service of beneficial price discrimination or to "grow the pie" (*see* Joint Reply at 60), but to use [redacted] (CO Br. at 87 n.40.) [redacted]

resulted in the very "absurd results" and "hornet's nest of problems" that prior decisions predicted will result from permitting such allocation. (*See* CO Br. at 76, 91-92, *citing, inter alia, Web IV,* 81 Fed. Reg. at 26382; *Cablevision Sys. Dev. Co. v. MPAA*, 836 F.2d 599, 607, 610-12 & n.20 (D.C. Cir. 1988).)

The Board had already found such an approach to be not only fundamentally unfair, but "absurd," in *Web IV*, explaining that "if a vendor offered an ice cream cone . . . for $1.00, but offered two ice cream cones for $1.06, it would be absurd to conclude that the true market price of an ice cream cone is the incremental six cents." 81 Fed. Reg. at 26382. The reason it is absurd is because it allocates the full $1.00 of value to the first ice cream cone, obviously undervaluing the second ice cream cone. [redacted][43]

In addition to the ice cream cone and free tire analogies in *Web IV*, other legal precedent demonstrates the problems with the prior bundle revenue definition. In *SDARS,* for example, the definition of "Gross Revenue" on which royalties are paid to copyright owners does not permit an

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[redacted] (*Id.* at 84, citing evidence.)

[43] The 25 cent mechanical floor for bundled offerings does not and did not in Amazon's case protect against revenue mis-measurement. There was no evidence anywhere in the record as to how the 25 cent number was derived or why it was less than other mechanical floors, such as the 50 cent mechanical floor for standalone portable services. (COF-439; Tr. 5990:21-5991:34 (Hubbard).) [redacted] (COF-327, citing HX-129; HX-1373, at AMZN00076200, lines 17 and 27.)

SDARS to engage in any allocation among offerings in a bundle. 37 C.F.R. § 382.22. Indeed, in that proceeding SiriusXM conceded that the amount allocated to the music service in the Premier Package bundle should be at least the standalone price of the Basic Package. *SoundExchange, Inc. v. SiriusXM Radio Inc.*, 65 F. Supp. 3d 150, 155 (D.D.C. 2014). The only dispute was whether the allocated amount should be the $12.95/month standalone price for the Basic Package or the $16.99/month price for the full Premier Package bundle. *Id.* After the district court stayed the action and referred the matter to the Board, the Board held that "the bundle of royalty-bearing and premium non-royalty bearing channels in a single price introduces an economically indeterminate and self-serving 'flexibility' that simply confuses the issue as to which portion of the entire subscription price reflects which type of channel." Determination of Rates and Terms for Preexisting Subscription Services and Satellite Digital Audio Radio Services, 82 Fed. Reg. 56,725, 56,734 (Nov. 30, 2017). It therefore held that SiriusXM was required to include the full price of the bundle ($16.99) in Gross Revenue. *Id.* at 56,735.[44]

Thus, the record evidence concerning that definition that was adduced, as well as legal precedent, shows that definition to be manifestly unreasonable. To adopt the prior service revenue definition on remand in the face of all of that contrary evidence and authority would be arbitrary and capricious. *See, e.g., Black Warrior Riverkeeper, Inc.*, 2021 WL 927260, at *1 (an "agency

[44] The economic indeterminacy problem inherent in bundles has been raised in other contexts, and in no instance has the problem been addressed by permitting a licensee to allocate values to the portions of the bundle that are not subject to the compulsory license, leaving whatever may be "left over," if anything, to the music that is subject to such license. (*See* CO Br. at 91-92, CO Reply Br. at 78-79, discussing authorities under the Section 111 compulsory license for cable operators, and other authorities.) And, again, the unexplained mechanical floor does not solve the problem and it was unsupported by any evidence by the Services. As noted above, Prof. Katz proposed changing the revenue definition and allocation (which is precisely what the FD did) or increasing the minimum (without addressing by how much). (Tr. 5055-5061)

action may be found arbitrary and capricious if the agency has . . . offered an explanation for its decision that runs counter to the evidence before the agency").

C. The Adopted Bundle Revenue Definition in the Final Determination Is Supported and Shown to Be Reasonable By Overwhelming Record Evidence and Legal Precedent

In contrast to the Services abject failure to support the prior bundle revenue definition with any evidence, there is ample evidence in the record supporting the adopted bundle revenue definition.

While the Services conceded there is no evidence in the record as to how they price or value the *non-music components* of their bundles, eliminating any royalty-bearing revenue, there is undisputed evidence in the record of how the Services price the *music component* of the bundles. For example, Spotify bundles its Premium streaming service with the New York Times for $260/year, while separately offering Premium for $9.99/month. (Rysman WRT ¶ 36 (HX-3032).)[45] Numerous other companies offer an interactive service at the $9.99/month price point (*e.g.*, Apple Music (HX-1431), Google Play (HX-692)). Some of those companies offer a reduced price service that, when compared to the $9.99 service, is limited in some way, for example, with respect to interactivity, or the devices with which it may be used (*e.g.*, Pandora Plus, which limits interactivity, and is offered for $4.99 (HX-2816); or Amazon's Echo device plan, which can only be used on an Echo, and is offered for $4.00 (HX-246)). There is plenty of evidence in the record of "standalone published prices" of music services that are already bundled with other products or services, that could in the future be bundled with other products or services, or that are

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[45] The Spotify/NY Times bundle also includes "two complimentary" subscriptions that can be given as gifts, and which are described to have a $50/month value. Subtracting such described values for these non-music components from Service Provider Revenue would result in zero value being ascribed to the Spotify Premium music service in the bundle. (CO Br. at 89, citing COF-509, Rysman WRT ¶ 36 (HX-3032).)

"comparable" to those that are or could in the future be bundled and could therefore be used or "average[d]," *see* 37 C.F.R. § 385.2 (2016) (Service Provider Revenue definition), in determining Service Provider Revenue under the adopted bundle revenue definition.

While Amazon argues that Prime Music "has no standalone equivalent" (Joint Br. at 75), Prime Music is a fully interactive service offering millions of songs, and so is comparable to Amazon Music Unlimited, which Amazon separately offers for $9.99 (or for $7.99 to Prime members). (*See* Tr. 1532:20-1533:3 (Mirchandani)). Regardless, Amazon ignores that the adopted bundle revenue definition contemplates a situation where there may be a service that has no precise "comparable." In those cases, the service is permitted to use the average standalone published price for "the most closely comparable product or service in the U.S. or, if more than one comparable exists, the average of standalone prices for comparables."[46]

Moreover, Amazon cannot seriously object to a bundle revenue definition that is based on the standalone published price of the music offering [redacted][47] [redacted]

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[46] Thus, for example, if Amazon could reasonably demonstrate that Prime Music is not precisely comparable to Amazon Music Unlimited or similar services offered at $9.99, it could use a comparable price for a more limited offering or an average of prices of appropriate comparables.

[47] *See e.g.*, AMZN Trial Ex. 163; CO EX. H-2740 ([redacted]); AMZN Trial Ex. 162; CO EX. H-2737 ([redacted]); AMZN Trial Ex. 164; CO EX. H-2739 ([redacted]).

[redacted] (*Id.*) [redacted]

In sum, the record evidence supports defining bundle revenue to base the revenue allocation on the standalone price of the music offering, rather than on the standalone prices of numerous other components of the bundle that were never proven and which were shown to be [redacted], as doing so reasonably addresses the economic indeterminacy issue.[48] Indeed, the Board recognized, in the context of bundling specifically, the problem of the Services' "obscur[ing] royalty-based streaming revenue by offering product bundles that include music service offerings with other goods and services, rendering it difficult to allocate the bundle revenue between royalty-bearing service revenue and revenue attributable to other products in the bundle," and that even the Services' own experts acknowledged that the Services generally have "an incentive and a capacity to minimize the amount of revenue that is attributed to the revenue base." (FD at 20.) The adopted bundle revenue definition solves these problems.

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[48] The Services assert that the adopted bundle revenue definition will result in "administrative complexity" for services like Amazon Prime, which are offered as a bundle and not on a standalone basis. (Joint Br. at 75.) To the extent having to refer to standalone prices of services or comparable services results in any "administrative complexity," that same or greater complexity exists in the prior bundle revenue definition, which likewise calls for the use of standalone prices for comparable services or an average of comparables. It seems that the Services' real objection to the adopted definition is not "administrative complexity," but to having to fairly value the royalty-bearing music component of the bundle.

CONCLUSION

For all of the reasons set forth herein and in Copyright Owners' prior submissions in this remand proceeding, Copyright Owners submit that this remand proceeding should be concluded on the scope of the three agreed issues identified in the Remand Order, and with the implementation of the rates and terms in the Final Determination.

Dated: January 24, 2022

Respectfully submitted,

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TAB B

PUBLIC VERSION

Before the
COPYRIGHT ROYALTY BOARD
LIBRARY OF CONGRESS
Washington, D.C.

In re DETERMINATION OF ROYALTY RATES AND TERMS FOR MAKING AND DISTRIBUTING PHONORECORDS (Phonorecords III)	Docket No. 16-CRB-0003-PR (2018-2022) (Remand)

ADDITIONAL WRITTEN DIRECT TESTIMONY OF RICHARD WATT (PHD)

(On behalf of Copyright Owners)

JANUARY 24, 2022

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I. Scope of assignment

(1) At the request of the Copyright Owners in this proceeding, the National Music Publishers' Association and the Nashville Songwriters Association International, I was asked to evaluate the questions and proposals in two orders from the Copyright Royalty Judges (the "Judges"), the December 9, 2021 *Notice and Sua Sponte Order* (the "December 9 Order"), eCRB Docket No. 25965, and the January 6, 2022 Order on Copyright Owners' Motion For Reconsideration (the "January 6 Order", and together with the December 6 Order, the "AMOs"), eCRB Docket No. 26039, including with respect to the "Working Proposal" discussed therein. My qualifications and CV are included in my Remand Written Rebuttal Testimony in this proceeding, filed on July 2, 2021, eCRB Docket No. 25425.

(2) I understand that there are legal concerns regarding the procedure of the AMOs and Working Proposal, addressed by counsel in separate briefing. I do not consider such legal issues or objections, but evaluate the AMOs and Working Proposal as economic proposals independent of the legal context and objections in which they arise.

II. Summary of opinions

(3) An overview of some of my primary opinions is as follows:

(i) The Judges are insightful in their determination that a combined royalty share of [redacted] percent of revenues is inappropriately low, and such a low share is unjustified under any proper Shapley analysis. My adjustment of Prof. Marx's model delivered a range of [redacted] percent for combined royalties, and my analysis incorporated assumptions from Prof. Marx that made it conservatively low. Prof. Gans' robust rebuttal Shapley model predicted combined royalties at [redacted] percent even when maintaining Prof. Marx's decision to model a single monopolist service, and up to [redacted] percent with other player modelling. These Shapley ranges are appropriate to address the Judges' query.

(ii) The Working Proposal formula for deriving revenue rates is, mathematically, exactly the same formula used to derive revenue rates in the Final Determination published on February 5, 2019 ("Final Determination"), and is thus of course consistent with that determination. However, there is an impactful error in one of the inputs in the Working Proposal. The Board's Shapley-derived ratio of sound recording to musical work royalties was 2.5:1, chosen out of a range from [redacted]. I will refer to this ratio in this report as the Shapley Content Share Ratio. The Working Proposal mistakenly substitutes 3.82:1, which is not a Shapley-derived ratio, but which comes from an *adjusted* TCC rate which itself was derived *from* the revenue rate. This output should not be used as an input to the very calculation from which it came.

(iii) The Judges appropriately raise important doubts about whether record company market power should impact the derivation of rates from Shapley analysis. I believe the answer is firmly in the negative. Not only does Shapley analysis eliminate the effects of abuse of market power, but in the current marketplace, there is no compelling support for the notion that record companies wield abusive market power over the services. On the contrary, the services possess a substantial information asymmetry that gives them the ability to obtain supranormal shares of the surplus from music streaming (including surplus that goes beyond the declared Service Provider Revenue on which the revenue rate royalties are calculated).

(iv) The Judges' framing for the Working Proposal appears to assume a dollar-for-dollar "see-saw" between sound recording and musical work royalty rates. As discussed in my rebuttal report, I do not think that this is a certain conclusion or a necessary assumption. The salient Nash bargaining insight captured by the Board is that a reduction of surplus would be *proportionally* borne by the labels. If the labels had in fact negotiated for nearly all of the surplus, then the reduction would be borne largely by them. And if the labels had *not* obtained nearly all of the surplus, then (1) the services would bear their proportion of a reduction in surplus and (2) this would further contradict arguments that there is a record company market power problem, since the services are successfully bargaining for and obtaining surplus. As I discussed in detail, the Board correctly captured the critical point, and the actual negotiated surplus shares do not change the calculus, since the bargaining parties will take changes into account and proportionally adjust as needed. The evidence on actual outcomes presented in the remand is entirely consistent with this analysis.

III. Concerns with the AMOs and Working Proposal

(4) As noted above:

- The AMOs accurately confirm that [redacted] percent combined royalties is too low and is not a reasonable Shapley analysis result.
- The Working Proposal is exactly the same formula for deriving a revenue rate as used the Final Determination, except that it utilizes a Shapley Content Share Ratio that is too high, falling even outside the range of ratios from Shapley analyses contemplated by the Board.

(5) Below, I will attempt to describe economic concepts that are raised in the AMOs and the Working Proposal, and address their consistency with the Final Determination and record. I will begin by taking a moment to explain some of the basics surrounding what a Shapley model "delivers" in results, and the different ways that one can portray those results. My hope is that this will help to unravel a conflation that has occurred between the Shapley Content Share Ratio and the adjusted TCC rate.

A. Explaining Shapley analysis results

(6) A Shapley model will simultaneously deliver surplus shares for all of the players in the model, which together add up to 100% of the surplus. Thus, if there are 3 players in the model, the Shapley will deliver 3 shares that together add up to 100%.

(7) The direct result of Shapley modeling is to deliver defined units of surplus (such as dollars or some other currency) to the players, rather than percentages or relative shares. However, the units of surplus are easily converted into percentages or relative shares. Here are different ways of portraying Shapley results, using a particular example:

<u>Units</u>

(8) As discussed above, a three-player Shapley analysis in a model with total available surplus equal to 50 units will directly deliver three shares of surplus in defined units, such as:

- 10 units to P
- 25 units to L
- 15 units to S

Percentages of the whole

(9) In order to better understand the context for unit shares, one could also represent them as percentages of the whole, by dividing each share into the whole:

- P's 10 out of 50 units are equivalent to 20% of the total surplus
- L's 25 out of 50 units are equivalent to 50% of the total surplus
- S's 15 out of 50 units are equivalent to 30% of the total surplus

Relative Shares: Ratios and Percentages

(10) In order to better understand relative positions, one could also directly represent player units in relation to other player units, such as:

- L's share = 2.5 x P's share
- S's share = 1.5 x P's share

(11) A more common way to describe these relationships is through a ratio (the quantitative relation between two amounts showing the number of times one value contains or is contained within the other):

- The ratio of L's share to P's share is 2.5:1 ("2.5 to 1")
- The ratio of P's share to L's share is 1:2.5 ("1 to 2.5")

(12) One can express these same ratio relationships in terms of fractions or percentages of one another, simply by taking one side of a ratio and dividing it by the other side of the ratio. Thus:

- The ratio of L's share to P's share is 2.5:1, so L's share is $\frac{2.5}{1}$ of P's share. $\frac{2.5}{1}$ is 2.5, which corresponds to 250% of P's share.
- In the other direction, P's share is $\frac{1}{2.5}$ of L's. $\frac{1}{2.5}$ is .40, which corresponds to 40% of L's share.

(13) These example shares of L and P are not arbitrarily chosen, but reflect the Board's Shapley Content Share Ratio, a 2.5:1 ratio of sound recording to musical work shares. When this ratio is expressed as a percentage, it can be seen as a TCC rate insofar as it states a musical work rate as a percentage of sound recording royalties.[1] Here, the 2.5:1 Shapley Content Share Ratio is mathematically equivalent to a 40% TCC rate.

[1] The ratio is expressed as "2.5:1" in the Final Determination, listing the sound recording share first, but can equally be expressed in the other direction, as "1:2.5", and described as the derived ratio of musical works to sound recording royalties.

(14) This process of expressing a ratio as a percentage relationship (1:2.5 = 40%) is straightforward mathematically, but the Board's use of a modified process to adjust the TCC rate has led to conflation of two distinct concepts in the AMOs and Working Proposal: (1) the Shapley Content Share Ratio, and (2) the *adjusted* TCC rate, which is derived from a different analysis. As shown below, the conflation of these two figures creates an inconsistency between the Working Proposal and the Board's findings in the Final Determination concerning the Shapley analyses.

B. How the 15.1% revenue rate was derived from Shapley analysis

(15) The Board derived the revenue rate percentage using two data points from Shapley analysis:

- The [redacted] combined royalties figure from Prof. Marx
- The 2.5:1 SR:MW ratio from Prof. Gans

(16) To be clear, while the Board's zone of reasonableness included a number of other data points, the final revenue rate of 15.1% is derived solely from these two data points. The appeals court in this proceeding accurately described this methodology and calculation in its decision. The court goes beyond my discussion to address evidence behind the full zone of reasonableness, but its summary of the Board's final derivation is:

> The Board ultimately settled on the revenue rate of 15.1% "based on the [[redacted]] highest value of overall royalties predicted by Professor Marx's model and the [2.5:1] ratio of sound recording to musical work royalties determined by * * * Gans's analysis." (84 Fed. Reg. at 1959–1960.)

Figure 1

[redacted]

(17) I will now walk through just how the revenue rate was derived from these two points.

(18) Going back to our initial point above, namely that a Shapley model will deliver the shares for all of the players simultaneously, we might ask why one would engage in determining the ratio of one player to another. The answer to this lies in the specific method that the Board used to derive the Shapley shares in this case. Due to the Board's lack of sufficient confidence in any of the individual Shapley models presented as a whole, the Board derived Shapley shares <u>in two steps, using two models</u>. The first step divides the pie into two slices. The second step divides one of those slices into two smaller slices. The two steps together accomplish the shares at issue. Here are the steps:

> <u>Step One</u>: the Board derived the split of surplus between two sides: (1) the digital services (S) on one side, and (2) the combined copyright owners (L+P) on the other. The split was determined using Shapley conclusions from Prof. Marx. The Board utilized [redacted] of the total for the combined royalties (L+P), and thus [redacted] of the total for the services.[2]
>
> <u>Step Two</u>: the Board determined the split of the combined royalties, in other words, the specific, smaller, shares for sound recording copyright owners (L) and musical work copyright owners (P). This was done using Shapley analysis from Prof. Gans, which determined the ratio to be 2.5:1. This ratio means that if there were 3.5 units of combined royalties, L's share would be 2.5 units and P's share would be 1 unit. If there were instead 7 units of combined royalties, L's share would be 5 units and P's share would be 2 units. And so on. Because P gets 1 unit for every 3.5 units of combined royalties, we can say that P gets $\frac{1}{3.5}$ of the combined royalties. Likewise, because L gets 2.5 out of every 3.5 units of the combined royalties, we can say that L gets $\frac{2.5}{3.5}$ of the combined royalties. Now we can see how simple the math is: to determine P's share, we simply multiply the [redacted] combined royalties by P's $\frac{1}{3.5}$ share. [redacted] x $\frac{1}{3.5}$ is the same thing as [redacted] divided by 3.5, and we see that [redacted]. The derivation of the revenue rate was as straightforward as that.[3]

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[2] As discussed further below, this was a notable decision because the Board had just previously determined, quite correctly in my view, that the [redacted] was part of a set of combined royalty values that "understate what would be a fair allocation of surplus to the upstream content providers." The Board now indicates an understanding that this value was indeed too low, and should be raised in order to calculate a fair royalty percentage. (December 9 Order, p.3, fn. 5, "the Judges do not find it appropriate to include in their analysis Professor Marx's assumption that the Services should retain [redacted] of the revenue generated by streaming, and the mechanical works royalty rate in the Judges' contemplated approach accordingly is higher than under Professor Marx's approach.")

[3] These same steps can be taken to derive L's share directly. [redacted] x $\frac{2.5}{3.5}$ is the same as [redacted] divided by 1.4, which equals [redacted] is of course also 2.5 x 15.1%, and [redacted] (allowing for errors due to rounding).

(19) With these two steps, the Board derived the shares for the 3 players in the Shapley analysis. Again, all three shares could be output simultaneously if a single Shapley model was being used, so the two steps are a function of the Judges utilizing aspects of two different Shapley models.[4]

(20) It is important to understand that this two-step derivation is still based entirely upon Shapley analysis outputs. It does not incorporate any record company market power distortions, and cannot warrant reduction due to such concerns, such as the Board's complementary oligopoly concerns with respect to the TCC prong, discussed below. The Board even refers to the revenue rate derived with its formula as the "(non-complementary-oligopoly) percentage revenue rate." (Final Determination at 73.)

(21) Therefore, regardless of what one might think concerning record company market power (which again I discuss below), the 15.1% revenue rate cannot be considered too high or inflated by any record company market dynamics. Quite the opposite, as noted above (footnote 2), the Board chose for its combined royalties input here a figure that it acknowledged was *too low*, and which thereby delivers a revenue rate that is too low.

C. How the adjusted TCC rate was derived from the 15.1% revenue rate

(22) The Board acknowledged that the direct TCC rate implicated by its Shapley analysis was 40%, based on the Shapley Content Share Ratio of 2.5:1. (Final Determination at 72, 75 (tables).) However, the Board did not use this directly-derived TCC rate out of concern for "importing complementary oligopoly profits" of record companies through the TCC rate. (Final Determination at 73.)

(23) The Board derived an "adjusted TCC" rate to address its concern. This rate was also derived using two data points, but both different than the ones used to calculate the revenue rate, and with the derived 15.1% revenue rate as one of the *inputs* to the adjusted TCC rate calculation.

(24) It is important to recognize at the start that this adjustment process only applies to the TCC rate, since that is the rate that could "import" record company market power to the musical work rate. As discussed above, the "non-complementary-oligopoly" revenue rate was derived using Shapley

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[4] The Board shows the result of this calculation in two tables in the Final Determination, on pages 72 and on page 75. The chart on page 72 is aptly titled, "Implied Musical Work Royalty (% of revenue) Based on Ratio and Total Royalties."

analysis and cannot "import" record company market dynamics, but on the contrary was set using an input (the [redacted]% combined royalties) that "understates" fair royalties.

(25) The adjusted TCC rate was derived using:

- The derived musical work revenue rate percentage (15.1%)
- The actual combined royalty rate in the market, [redacted] to represent the market ([redacted]%)

(26) We can see that these two metrics are the only inputs in the formula expressed by the Board:

> The target TCC rate is computed using the formula $TCC = 1 \div ((R_t/R_{mw}) - 1)$, where R_t is the **combined royalty rate in the marketplace** ([[redacted]]%), and R_{mw} is **the musical work royalty rate yielded by the Shapley value analysis**. (Final Determination at 73, fn. 135.)

Figure 2

[redacted]

(27) As this shows, the January 6 Order statement that the Working Proposal "appl[ies] without alteration the Majority's 26.2% TCC that generated the percent-of-revenue rate of 15.1%", should be corrected. (January 6 Order at page 9 (citing to page 75 of the Final Determination).) The 26.2% adjusted TCC does not generate the 15.1% revenue rate, but rather it is the reverse.

D. [redacted] mirrors the formula used in the Final Determination

1. The Working Proposal utilizes the same base formula as the Final Determination

(28) The Judges have put forth a formula for deriving the musical works rate in the Working Proposal. As it happens, this Working Proposal formula mirrors the formula used by the Board in the Final Determination for deriving the 15.1% revenue rate, but with the Shapley Content Share Ratio changed.

(29) The two formulas are exactly equivalent expressions using two variables: (1) a combined rate for sound recording and musical works; and (2) a ratio of sound recording to musical work royalty rates. As discussed above in connection with the formula used in the Final Determination, the first variable divides the pie into two slices (the combined content share and the service share) and the second variable divides the content slice into a sound recording slice and a musical work slice.

(30) The formula is quite simple. It works on the premise that: Combined Rate = Sound Recording Rate + Musical Work Rate. Of course, if one knows 2 out of 3 rates, it is easy to solve for the third. But if one knows 1 out of 3 rates and the *ratio* of the other two rates to each other, it is also easy to solve for them. This is what the formula does.

(31) Despite being the same formula, the Working Proposal formula at first glance may seem different. This is simply the result of different terminology. While the Board discussed "combined royalties", the Working Proposal discusses what the Services are "allowed to retain." Despite the distinct phrasing, what the Services are "allowed to retain" is just the difference between total surplus and combined royalties. The Judges acknowledge this in the January 6 Order:

> [T]he Working Proposal uses a hypothetical percent-of-revenue rate of 32% as the revenue percentage that the complementary oligopolistic Major record companies allowed the Services to retain. Arithmetically, this 32% example means that the licensors of the sound recordings and the musical works would have been paid 68% of the revenues generated by interactive services. (January 6 Order at 9.)

(32) Further, while the Final Determination solves directly for the musical work rate, the Working Proposal solves for the sound recording rate (requiring an extra step to then solve for the musical work rate from the sound recording rate).

(33) In the Board's discussion of deriving the rates, it provides tables solving for both the musical work and the sound recording rate with this formula. (Final Determination at 72.) The Working Proposal method is the same as reflected in the second table on page 72, except with the Shapley Content Share Ratio changed.

2. The Adjusted TCC rate cannot be substituted for the Shapley Content Share Ratio in the formula

(34) The Judges appear to have an intention for the Working Proposal to use the same Shapley Content Share Ratio as was determined in the Final Determination, except applied to a higher combined royalty rate:

> Thus, in the Working Proposal, the Judges indicated their interest in potentially identifying from the existing record an appropriate percentage of revenue that these complementary oligopolists allow the Services to retain, and then **applying the same percentages that the Majority utilized in the Phonorecords III Determination**. Simply put, **the Judges have not indicated a willingness to revisit the Shapley Value proportions**, but rather to apply them in a formula that is based on the record and that reflects the actual workings of the market. (January 6 Order at 6.)

(35) As discussed above, the language "an appropriate percentage of revenue that these complementary oligopolists allow the Services to retain" is another way of identifying combined royalties. Thus, the Judges describe the Working Proposal as identifying a new, higher combined royalty rate, and applying the same Shapley Content Share Ratio.

(36) As discussed above, the Working Proposal base formula mirrors that in the Final Determination, and thus would be appropriate to use to accomplish the Judges' intention, if used with the correct Shapley Content Share Ratio. In discussing "the Shapley Value allocations that the Majority determined previously", the December 9 Order states that, "the ratio adopted by the Majority in the determination under review was 3.82:1." (December 9 Order at 2.) As discussed above, the Shapley Content Share Ratio used by the Board was 2.5:1.

(37) Utilizing a 3.82:1 ratio in this formula drastically reduces the royalty rate. 3.82:1 is the reciprocal of the *adjusted* TCC rate, which reduces the directly derived TCC rate by 35 percent to address complementary oligopoly concerns. If this substantially reduced output is fed back in as an input, it would double the reduction and apply it to a revenue rate when there is no economic basis for such a reduction.

(38) This input mix-up leads the examples in the December 9 and January 6 Orders to predict royalty rates well below what they should generate at the various contemplated combined royalty rates. Since the Working Proposal with the correct Shapley Content Share Ratio is the same formula as used in the Final Determination, there is already a chart in the Final Determination that identifies the predicted revenue rate at various combined royalty rates. This is found in the first table on page 72 of the Final Determination, and indicates, for example, that 67% combined royalties delivers a revenue rate of 19.1% (rather than the 13.9% identified in the January 6 Order, p. 10).

(39) Further, the table on page 73 of the Final Determination explains that, as this combined royalty rate rises, the adjusted TCC rate also rises (because there is less of a reduction to align the model's combined royalty rate with the actual market combined royalty rate), an important mathematical fact that should be factored into any re-evaluation of rate percentages. As the combined royalty rate in the model increases, the adjusted TCC rate will converge on the 40% TCC rate derived from the Shapley analysis, which is a more appropriate TCC rate under the Board's other findings.

(40) Thus, the Working Proposal can address the Board's concern that the [redacted]% combined royalty rate was too low, but to "maintain the Shapley Value proportions", the formula should use the 2.5:1 Shapley Content Share Ratio. The 3.82:1 ratio would not be appropriate to use as an input for the revenue rate derivation. Doing so would unjustifiably import complementary oligopoly reductions into the "non-complementary-oligopoly" revenue rate.

E. Appropriate combined royalty rates

(41) The Judges request input concerning "a market-based percent-of-revenue that the Major record labels allow the interactive services to retain in order to provide for the latter's viability."[5] (January 6 Order at 11.) As discussed above, the Order elsewhere explains that this is meant to be equivalent to 100% less the combined royalty rate, which means delivering either the service share or the combined royalty rate solves for this variable. We can find guidance on proper numbers for these variables from the Shapley analysis evidence in the record.

[5] This way of describing the share of surplus that the service obtains after negotiated transactions is unusual, as it implies an omniscience and omnipotence of the part of the Majors that is not realistic. As discussed in my remand rebuttal report [redacted]. (Watt RWRT at ¶¶ 39-40.) A party that cannot even accurately

(42) My report at the original hearing was in rebuttal of Prof. Marx and so worked from her assumptions. While I adjusted some assumptions to show some of her modelling errors, my points were limited (for example, I did not adjust for her failure to include *any* costs for songwriters), and I noted multiple times that my analysis of royalty shares was conservatively low. (*See, e.g.*, Watt WRT at 30, fn.16, 33, fn.21, 54-59.) The range delivered was [redacted] percent, and I specifically noted the midpoint as a conservative value within the range.

(43) The Judges' survey of Shapley evidence from this proceeding on this question should not end with Prof. Marx and my rebuttal though. In his rebuttal report, Prof. Gans provided an insightful and very robust Shapley analysis that addressed the shares of all three players. Prof. Gans' initial Shapley analysis, from which the Board drew its 2.5:1 Shapley Content Share Ratio, focused on the division of surplus between sound recording and musical works rightsholders. In his rebuttal report, Prof. Gans also addressed Prof. Marx's Shapley analysis, and modeled multiple multi-player Shapley scenarios:

- Prof. Gans' first rebuttal Shapley scenario maintains Marx's Shapley model with a single service, in which each player is a monopolist, but adjusting for unsound revenue and cost assumptions. (Gans WRT at 36-54.) With a single service, correcting only for other inputs, this model predicts **combined royalties of [redacted] percent**. (Gans WRT at 70, Table 2.) In my view, modeling the services as a monopolist leads to *over*statement of their fair share, given their greater substitutability in the market. Certainly, the services cannot complain of market power bias when they are modeled as a monopolist.
- Prof. Gans' other two Shapley scenarios model multiple services. (Gans WRT at 55-62.) These Shapley models predict **combined royalties of [redacted] percent and [redacted] percent**. (Gans WRT at 70, Table 2.)

(44) Prof. Gans' rebuttal Shapley analysis is a helpful contribution to the assessment of an appropriate combined royalty rate. It reinforces that the combined royalty rate should be substantially higher than [redacted] percent, and is backed by sophisticated economic analysis and detailed explanation. In my opinion, the ranges in the rebuttal Shapley analyses done by myself and Prof. Gans would be

identify the surplus cannot be assumed to obtain all of the surplus in negotiations. Rather, the services can leverage their information asymmetry to obtain supranormal surplus. (*Id.* at ¶¶ 39-40, 51; Eisenach RWRT at ¶¶ 46-51.)

appropriate estimates to use in the Working Proposal, together with the Shapley Content Share Ratio.[6]

F. Shares of surplus in Shapley analysis and Nash bargaining

(45) The December 9 Order stated that:

> The Copyright Owners' experts testified that the Majors will set royalty rates that allow the Majors to acquire all of the surplus generated in a Shapley Value Model, less any of that surplus Copyright Owners might acquire if the mechanical royalty rates set by the Judges were high enough to allow them to acquire a portion of that surplus. (December 9 Order at 2.)

The January 6 Order then clarified that "the expert who testified regarding the division of the Shapley surplus between the Major sound recording companies and Copyright Owners was Professor Watt, whose testimony in this regard was quoted by the Majority. See Phonorecords III Determination at 72." (January 6 Order at 10.)

(46) This quote of my testimony on page 72 of the Final Determination is:

> [The reason] my predicted fraction of revenues for sound recording royalties is significantly less than what is observed in the market [is] simple. The statutory rate for mechanical royalties in the United States is significantly below the predicted fair rate, and the statutory rate effectively removes the musical works rightsholders from the bargaining table with the services. Since this leaves the sound recording rightsholders as the only remaining essential input, bargaining theory tells us that they will successfully obtain most of the available surplus. (Watt WRT ¶ 36)

(47) As the quote indicates, I did not testify that the Majors acquire all of the surplus generated in a Shapley Value Model. Here I clarify some points concerning these topics:

- No player is allocated all of the surplus in a Shapley model. If a player is modelled to make outsized contributions to surplus, they may be allocated most of the surplus, but all players receive surplus shares, in proportion to their contributions.

[6] It is worth noting that the content share ratios delivered by the Shapley analyses in Prof. Gans' rebuttal are much lower than the 2.5:1. The rebuttal report ratios are [redacted] and [redacted]. I think that these lower ratios, which would predict even higher revenue rates, reflect a more appropriate prediction of the hypothetical free market with effective competition. It is also important to note that neither Prof. Gans nor I adjusted for revenue diminution, meaning these shares should be of *all* of the value generated by the licensed uses, not just what might be collected in subscription fees or advertising charges and declared as "Service Provider Revenue." In the absence of a definition that reliably captures this full value, calibrated alternative rate prongs (including TCC, per-subscriber and per-play prongs) should be included to deliver the fair shares.

- The relevant insight from Nash bargaining theory is that it predicts that sound recording rightsholders will obtain a share of the surplus that is commensurate with their bargaining power. This share will be large if in fact the record companies have disproportionately large bargaining power, and small if the reverse is true. As I discussed at length in my remand rebuttal report, my Nash model worked from Prof. Marx's assumption that record companies have very high bargaining power, which led to the conclusion above. This assumption also leads to the corollary conclusion that, if the record companies obtained most of the surplus, then a decline in surplus would be mostly borne by the record companies. This feature is what has become known as the "see-saw", and it has been the subject of much debate throughout this remand. My remand rebuttal report explains in great detail how this dynamic works, and why the Board's insights from Nash bargaining were appropriate and consistent with economics. (Watt RWRT at 7-82)
- I have not testified concerning particular issues of Major record company market power, let alone that Majors acquire all of the surplus. Below I provide economic thinking to ground a discussion of so-called "must have" record companies. It is also important to note that if the Majors extract all of the surplus from the interactive streaming market, less what musical work rightsholders obtain, that would also imply that independent record companies are not obtaining any surplus. These are not opinions that I have advanced or to which I subscribe.

(48) The Judges state that the Majors acquire all of the residual surplus, *less the musical work royalty*.[7] Importantly, this claim assumes a see-saw effect of 100%, that is, any increase in the musical work rate will result in a decrease in the sound recording rate of the same amount, leaving total royalties constant. Under this assumption, the Services would be agnostic as to the musical work rate, as they would not be receiving surplus anyway, and increases to the musical work rate would simply lead to a commensurately lower sound recording rate.[8] I do not advance a see-saw effect of 100%, nor do I believe that it is necessary to do so to support the Board's conclusions on Nash bargaining. As explained in detail in my RWRT, the salient insight from Nash bargaining, which

[7] *See, e.g.*, December 9 Order at 2 ("The Copyright Owners' experts testified that the Majors will set royalty rates that allow the Majors to acquire all of the surplus generated in a Shapley Value Model, less any of that surplus Copyright Owners might acquire if the mechanical royalty rates set by the Judges were high enough to allow them to acquire a portion of that surplus.")

[8] It is important that this is the logical conclusion of a premise that record companies extract all of the surplus from the market. If such was true, then the Services would not be obtaining any surplus, no matter what happens with the musical work rate. Lowering the musical work rate would only give more surplus to the record companies, and raising the rate would only take surplus from the record companies.

the Board accurately captured, is that declines in surplus should be expected to be borne in the proportions that gains in surplus were obtained.

IV. Relevance of record company market power

(49) In the January 6 Order, the Judges ask:

> What is the impact, if any, of the Major record companies' complementary oligopoly power on the appropriateness of relying on their rates and "greater-of" rate structures to determine the revenue base for the calculation of royalties to be paid and received under statutory mechanical rate?

The question of record company market power may be worth breaking into two parts. First is the question of whether or not a "Cournot complements" problem exists. I believe the answer to this is plainly in the negative. The second is then whether there remains any effective competition problem to address concerning record companies being "must haves." In sum, my conclusion is that there is no basis in economic theory to justify reducing royalties due to concerns over record company market power.

A. Cournot complementary oligopoly theory

(50) There have been a number of references to the concept of "complementary oligopoly", as described in the theories of the 19th-century French mathematician Antoine Augustin Cournot, throughout this proceeding, although no economic modelling or empirical analysis showing how the concept might apply. This flags an issue of concern, and the Judges are astute to re-examine the issue and question its applicability. The Cournot model from which the concept comes is a strict mathematical proof of an unusual and counterintuitive scenario that does not appear to be applicable in this context.[9]

(51) Cournot's complementary oligopoly theory is at its core a mathematical proof that given certain conditions, multiple sellers of complementary goods will charge more than a single seller of the same goods. The Cournot complements problem is an example of the well-known "prisoners' dilemma", in which by pursuing individually optimal pricing strategies, suppliers of the complementary inputs end up worsening their aggregate and individual welfare from other

[9] Prof. Spulber addressed the inapplicability of this Cournot theory to the sound recording license market in his rebuttal report, an analysis that accurately captures the economics. (Spulber RWRT at ¶¶ 53-71.)

options that are available to them. However, Cournot's mathematical proof only works under very specific assumptions:

- The prisoners' dilemma is a statement on one-shot games (economic interactions that are not repeated), in which the players are unable to communicate. Both of those premises are incorrect in this market, which is a case of repeated interaction, and where the players do have the ability to communicate.[10] Cournot's problem would not even arise in theory in this situation. The fact that the problem does not arise in theory calls attention to the lack of empirical analysis that it occurs in fact.
- The proof only works under the assumption that the consumer's demand for the final product (which is the full set of all inputs) is downward sloping in the total price paid for inputs. So, it is necessary that the services' demand for inputs is a strictly decreasing function of the aggregate price that must be paid. But for this to happen, the services must demand a greater number of units of each input as the price is lowered, and a smaller number of units of each input as the price is raised. When the input is a blanket license to use with as many subscribers and plays as the service likes, then then the service only needs 1 unit of total input (the license to access the label's catalogue), the demand curve is flat, and another necessary predicate for a complementary oligopoly problem would not arise.

(52) Another problem with the complementary oligopoly theory is that it is premised on a lack of competition among record companies. But this is not what we see in the market. Record companies appear to compete intensely, including on price. The market shows that licenses between record companies and services are structured with the record companies agreeing to take only a prorated portion of a single pool, based upon the share of plays of their works, a share that is determined by whether their sound recordings are played by users instead of other sound recordings. The final payment to the record company is then a fraction of that royalty pool, where the fraction is the ratio of plays from the catalogue of the record company in question to the total number of plays on the service.[11]

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[10] This is not to say that there is collusion. As Prof. Gans explained at the hearing, the existence of negotiation eliminates the Cournot problem because the *buyer* will allow for the necessary coordination. (Hearing Tr., 4001:12-4006:25 (Gans).) It must be remembered that the Cournot complementary oligopoly is a situation that *no one wants to occur*. If it existed, the seller would suffer from it just as the buyer would, and so would welcome its avoidance.

[11] The Judges discuss sound recording licenses in detail in the *Web V* Final Determination, and this royalty structure is at the heart of the concept of "steering." *See, e.g.*, *Web V*, 86 Fed. Reg. at 59461-64. The fact that record companies accept a royalty structure that even allows for the risk of steering or other low-play royalty losses, instead of

(53) Record companies thus compete intensely for plays, *which determines the price they receive for the license to their catalogue*. The price that each record company ends up receiving for its repertory is determined by a highly competitive process in which record companies compete for plays, which also translates to the record companies competing on price.

(54) Note that this structure also places substantial risk upon the record companies. If they do not create and effectively market successful sound recordings, they can face a precipitous decline in royalties. If the record companies were indeed monopolists, they would not choose this royalty structure. They would choose the option to avoid this risk and competition, by simply demanding a set price that is not prorated with other suppliers (for example, instead of taking a prorated share of 50% of revenues, a record company could demand simply 20% of revenues, or even a flat fee).

(55) These are just some of the problems with applying Cournot's theory to this market. The theory also requires that the services have no bargaining power at all. These are severe economic conclusions, which would call for rigorous proof, including empirical evidence of the required predicates and predicted effects.

B. "Must have": necessity and contribution of value

(56) The idea of record companies being "must have" has become linked with royalty rate reductions. (Final Determination at 54 (noting "the complementary oligopoly effect arising from the 'must have' status of the sound recordings") and 73 (reducing TCC rate to avoid "importing complementary oligopoly profits").) This link should be scrutinized because it runs counter to what economics tells us typically should happen. Economics generally finds that market players that provide unimportant, unnecessary goods should receive *less*, and market players that provide important, necessary goods should receive *more*.

(57) As discussed above, simply having "must have" sellers does not make Cournot's theory applicable, but rather that theory is not applicable to this market. Further, there is no economic basis for reducing a Shapley-derived share, or a benchmark rate, based simply upon the party being critically important to the joint enterprise. On the contrary, necessity is what we would examine to *validate* a party's *larger* share of surplus. We must recognize a distinction between

demanding royalties not contingent on play share, is alone persuasive evidence that they do not exert monopoly control over the market.

necessity or contribution of value, on the one hand, and abuse of market power on the other, even if there may be situations where the two occur at the same time. Necessity and contribution of value are not economic grounds for *reducing* a party's share of surplus. Abuse of market power can be a basis to reconsider a party's negotiated share. But that calls for an economic argument showing abuse of market power. Economic evidence of necessity and contribution of value are not the same thing or a substitute. Using a showing of necessity or contribution of value to derive an abuse of market power conclusion is not economically supportable.

I, Richard Watt, declare under penalty of perjury under the laws of the United States of America that the statements contained herein are true and correct to the best of my knowledge, information and belief. Executed on January 24, 2022 in Christchurch, New Zealand.

Richard Watt

Richard Watt

TAB C

PUBLIC VERSION

Before the
COPYRIGHT ROYALTY BOARD
LIBRARY OF CONGRESS
Washington, D.C.

In re **DETERMINATION OF ROYALTY RATES AND TERMS OF MAKING AND DISTRIBUTING PHONORECORDS (Phonorecords III)**	**Docket No. 16-CRB-0003-PR (2018-2022) (Remand)**

ADDITIONAL WRITTEN DIRECT TESTIMONY OF
JEFFREY A. EISENACH, PH.D.

Expert Witness for Copyright Owners

January 24, 2022

CONTENTS

I. INTRODUCTION AND SUMMARY OF FINDINGS

1. My name is Jeffrey A. Eisenach. I am a Managing Director and Co-Chair of the Communications, Media and Internet Practice at NERA Economic Consulting ("NERA"). On behalf of the National Music Publishers' Association ("NMPA") and Nashville Songwriters Association International ("NSAI") (together referred to as "Copyright Owners"), I submitted Written Direct Testimony in the *Phonorecords III* proceeding ("Eisenach WDT") on October 31, 2016, Written Rebuttal Testimony ("Eisenach WRT") on February 13, 2017, Supplemental Written Rebuttal Testimony ("Eisenach SWRT") on March 1, 2017, and Written Rebuttal Testimony in this Remand proceeding ("Eisenach RWRT") on July 2, 2021. I also presented oral testimony at the Hearing and was qualified by the Judges as an expert witness in microeconomics, the economics of industrial organizations, and regulatory economics. My qualifications are detailed in Eisenach RWRT, which also includes a copy of my curriculum vitae.

A. Assignment

2. I have been asked by counsel for Copyright Owners to assess and offer my expert economic opinion on certain issues raised by the Board's December 9, 2021 *Notice and Sua Sponte Order Directing the Parties to Provide Additional Materials* (*Additional Materials Order*)[1] and its January 6, 2022 *Order Granting in Part and Denying in Part Copyright Owners' Motion for Reconsideration or, in the Alternative, Clarification* (*Clarification Order*).[2] Specifically, the

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[1] U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Notice and Sua Sponte Order Directing the Parties to Provide Additional Materials*, Docket No. 16-CRB-0003-PR (2018-2022) (Remand) (December 9, 2021) (hereafter "*Additional Materials Order*").

[2] U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Order Granting in Part and Denying in Part Copyright Owners' Motion for Reconsideration or, in the Alternative, Clarification*, Docket No. 16-CRB-0003-PR (2018-2022) (Remand) (January 6, 2022) (hereafter "*Clarification Order*").

Additional Materials Order explains that the Judges "are considering the possibility of setting rates and a rate structure for the Phonorecords III period that no participant has specifically proposed, but that would incorporate only record evidence"[3] and describes some aspects of the rate structure the Judges are considering. The *Clarification Order* provides further explanation of the approach under consideration, which it refers to as "the Working Proposal."[4] Both orders ask the parties for input relating to the operation of the Working Proposal and to the specific inputs that might be utilized to calculate rates if it were adopted.

3. In this context, this report focuses on three issues. First, to what extent is the methodology for determining mechanical royalties embodied in the Working Proposal consistent with the analytical framework and findings of the *Final Determination*?[5] Second, what does the record evidence indicate is the appropriate Combined Royalty Rate (defined in n. 6 below) to be used as an input in calculating mechanical royalties,[6] and (relatedly) how do the relative bargaining power of the parties and the "complementary oligopoly" theory affect the proper economic analysis of this question? Third, what would be the impact if the Judges were to adopt the rate structure arrived at in the *Final Determination* but without a True Total Content Cost (TCC) prong?[7]

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[3] *Additional Materials Order* at 2. The *Additional Materials Order* also asks the parties to provide further input on the definition of "Service Revenue" as it relates to bundled offerings. *Id.* My assignment is limited to input on the rates and rate structures.

[4] *Clarification Order* at 9.

[5] U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Final Determination*, Docket No. 16-CRB-0003-PR (2018-2022) (November 5, 2018) (hereafter "*Final Determination*"); *see also* U.S. Copyright Royalty Judges, *In the Matter of Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III), Order Regarding Proceedings on Remand,* Docket No. 16-CRB-0003-PR (2018 – 2022) (Remand) (December 15, 2020) (hereafter "*Remand Order*").

[6] The Combined Royalty Rate is the "combined sound recording and musical work royalties as percentage of revenues." *See* Eisenach RWRT at ¶6. *See also Final Determination* at 65. This is equivalent to "1.00… - the record companies' assumed concession of royalty revenue required for the Services' survival," as described in the *Additional Materials Order*. See *Additional Materials Order* at 3, Point 7.

[7] As in my remand rebuttal testimony, I refer to the "greater of" TCC prong adopted in the Final Determination as a "True TCC prong," reflecting that its operation is not "capped" by a lower all-in per-subscriber rate.

4. While I am aware that there are legal and procedural objections to the Working Proposal and related issues, my opinions address the substantive economic topics described herein without regard to legal context and procedure.

5. In forming my views, I have relied upon the materials cited in this testimony and set forth at Appendix A to this report.

B. Summary of Findings and Opinions

6. My primary findings and opinions include the following:[8]

- The methodology for determining mechanical royalties embodied in the Working Proposal requires adjustment in order to be consistent with the analytical framework and findings of the *Final Determination*. As explained in the *Additional Materials Order* and clarified in the *Clarification Order*, the Working Proposal would establish a percentage of revenue rate based on the *Final Determination's* TCC rate of 26.2 percent. However, as I explain, the *Final Determination's* 26.2 percent TCC rate was itself derived based on the Board's determination – grounded in the Shapley analyses of Professor Gans and Professor Marx – of a 15.1 percent of revenue rate. Absent that determination there is no basis in the *Final Determination* for a TCC rate of 26.2 percent. Thus, the 26.2 percent TCC rate cannot properly serve as the starting point for a *de novo* calculation of a percentage of revenue rate.

- The Working Proposal should be adjusted to utilize the 2.5:1 ratio of sound recording to musical work royalties that was adopted in the *Final Determination* based upon Shapley analysis. This would produce a common formula equivalent to, and consistent with, the *Final Determination* formula.

- The evidence supports the Judges' determination in the *Additional Materials Order* that the Combined Royalty Rate utilized in the *Final Determination* to establish the mechanical royalty rate ([redacted] percent) is unreasonably low. Specifically, the record provides reasonable benchmarks for the Combined Royalty Rate of between [redacted] and [redacted] percent. Applying these percentages to the formula in the *Final Determination* (which is equivalent to the Working Proposal once it is corrected to apply a 2.5:1 sound recording to musical work ratio), implies a percentage of revenue rate of between [redacted] and [redacted] percent, which would be a reasonable rate that is consistent with the 801(b) factors.

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[8] The summary below is not intended to be comprehensive; the full range of my findings is as expressed in the body of this testimony.

- This range is also consistent with an economically proper understanding of the role of complementary oligopoly power and the relative bargaining power of the Services and the record labels.

- Removing the TCC prong from the rate structure would significantly reduce protection against revenue deferral, displacement and mismeasurement. The precise impact on royalties over the five-year rate period would depend on the specific final rates and terms, but the effect would likely [redacted]. Removing just the TCC prong from the Final Determination rates and terms would cause the loss of approximately [redacted] from just the four Services.

7. These findings and opinions are based on information available to me at the time this Testimony was submitted; I reserve the right to modify or expand upon my analysis and opinions if additional evidence becomes available.

C. Structure of this Report

8. The remainder of this report is organized as follows. In Section II, I explain why the methodology for determining mechanical royalties embodied in the Working Proposal requires adjustment in order to be consistent with the analytical framework and findings of the *Final Determination*. Section III presents my analysis and opinions relating to the correct Combined Royalty Rate percentage that should be used to calculate the mechanical royalty percentage of revenue rate. Section IV addresses the impact of removing the True TCC prong. Section V presents a brief conclusion.

II. THE WORKING PROPOSAL'S METHODOLOGY FOR DETERMINING MECHANICAL ROYALTIES REQUIRES ADJUSTMENT IN ORDER TO BE CONSISTENT WITH THE EVIDENCE AND WITH THE FINAL DETERMINATION

9. In this section, I explain why the methodology for determining mechanical royalties embodied in the Working Proposal requires adjustment in order to be consistent with the evidence compiled in both the original hearing and these remand proceedings, and with the reasoning in the *Final Determination*. In the first subsection, I explain how the Board arrived at its determination of a 15.1 percent percentage of revenue rate based on the Shapley analyses of Professor Gans and

Professor Marx, and how the 26.2 percent adjusted TCC rate was then derived using the 15.1 percent percentage of revenue rate as an essential input. In the second subsection, I explain specifically why the approach embodied in the Working Proposal is inconsistent with the findings of the *Final Determination* and the statutory criteria.

A. The 26.2 Percent Adjusted TCC Rate in the Final Determination Is Derived Using the 15.1 Percent of Revenue Rate as an Input

10. In this subsection, I explain that the analytical framework used by the Board to arrive at the percent-of-revenue and TCC royalty rates in the *Final Determination* can be properly understood as consisting of the following process:

- Determine an appropriate ratio of sound recording royalties to musical works royalties (2.5:1).
- Determine an appropriate Combined Royalty Rate ([redacted] percent).
- Apply the sound recording to musical works royalty ratio to the Combined Royalty Rate to arrive at a percent of revenue rate for musical works royalties (*i.e.*, [redacted] = 15.1 percent).
- Adjust the TCC rate to correspond to the 15.1 percent of revenue rate in the marketplace, such that musical works royalties paid under the TCC prong would be equal to the royalties paid under the percentage of revenue prong, given then-current combined royalties in the marketplace (*i.e.*, [redacted] percent / ([redacted] percent – [redacted] percent) = 26.2 percent).

11. In the four subsections below, I briefly describe the evidence and analysis utilized by the Judges in each step.

1. Determine an Appropriate Ratio of Sound Recording Royalties to Musical Works Royalties

12. The Judges considered estimates of the appropriate ratio of sound recording to musical works rates from Professor Watt ([redacted]), Professor Gans (2.5:1) and Professor Marx ([redacted]).[9] The

[9] *Final Determination* at 62-71.

Final Determination found Professor Gans' estimates to be "reasonable" and "informative,"[10] and ultimately relied upon Professor Gans' 2.5:1 ratio to calculate the percentage of revenue rate.[11]

2. Determine the Appropriate Combined Royalty Rate

13. To determine the appropriate Combined Royalty Rate, the Judges considered evidence from the Shapley models of Professors Marx and Watt.[12] Professor Marx's model showed Combined Royalty Rates of between [redacted] percent and [redacted] percent of service revenue, while Professor Watt's model showed combined royalties of between [redacted] percent and [redacted] percent. The Judges found that "the total royalty values produced by Professor Marx's models understate what would be a fair allocation of surplus to the upstream content providers. Consequently, the Judges view Professor Marx's top value for total royalties ([[redacted]]%) to constitute a lower bound for total royalties in computing a royalty rate," but ultimately relied on Professor Marx's [redacted] percent value for their calculation.[13]

3. Calculate the Percent of Revenue Rate by Applying the Ratio to the Combined Royalty Rate

14. The third step in the process was to determine the all-in musical works percent of revenue rate prong of 15.1 percent. The *Final Determination* includes a table which presents the full range of implied rates based on sound recording to musical work ratios and combined royalty rates and

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[10] *Final Determination* at 70; see also *Johnson v. Copyright Royalty Bd.*, 969 F.3d 363 (D.C. Cir. 2020) at 43 ("When it came to the expert evidence on which the Board chose to rely – the 'ratio of sound recording to musical work royalties that * * * Gans derived from his analysis' – the Board specifically found that aspect of Gans' analysis to be reasonable and 'informative.'… That type of line-drawing and reasoned weighting of the evidence falls squarely within the Board's wheelhouse as an expert administrative agency.").

[11] *Final Determination* at 87 ("The Judges have determined a rate that is computed based on the highest value of overall royalties predicted by Professor Marx's model and the ratio of sound recording to musical work royalties determined by Professor Gans's analysis.").

[12] The judges distinguished the Shapley-based Combined Royalty Rate evidence from the actual combined royalties paid by the services, which they determined "is inflated both by the existence of complementary oligopoly conditions in the market for sound recordings and what Professor Watt describes as the record companies' ability to obtain most of the available surplus due to the music publishers' absence from the bargaining table." *Final Determination* at 73.

[13] *Final Determination* at 75. *See also Final Determination* at 87.

a second table which presents a narrower range based on "reference to the strength of evidence supporting the numbers underlying those rates."[14] Both tables are reproduced below.

FIGURE 1:

[redacted]

15. As indicated by the yellow highlights and the red circles, the percentage of revenue rate chosen by the majority of 15.1 percent corresponded to Professor Gans' 2.5:1 sound recording to musical works ratio (which is equivalent to a TCC rate of 40 percent) and Professor Marx' [redacted] percent Combined Royalty Rate.[15]

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[14] *Final Determination* at 75.

[15] *Final Determination* at 75; see also *Johnson v. Copyright Royalty Bd.*, 969 F.3d 363 (D.C. Cir. 2020) at 42 ("The Board ultimately settled on the revenue rate of 15.1% 'based on the highest value of overall royalties predicted by Professor Marx's model and the ratio of sound recording to musical work royalties determined by * * * Gans's analysis.'"). The *Final Determination* used the formula $R_{mw} = R_t \div (1 + r)$ "where R_{mw} is the musical work royalty rate, R_t is the combined royalty rate for musical works and sound recordings, and r is the ratio of sound recording to musical work royalties." See *Final Determination* at 72, n. 130. Applying the figures above to this formula results in $R_{mw} = 0.1514$:

$R_{mw} =$ [redacted] ≈ 0.151

4. Adjust the TCC Rate to Correspond to the 15.1 Percent Percentage of Revenue Rate Under Then-Current Market Conditions

16. In its discussion of deriving rates, the Board noted a concern with "importing complementary oligopoly profits into the musical works rate through a TCC percentage."[16] The concern was that if the sound recording rate was improperly inflated by complementary oligopoly conditions, then the TCC rate could pass through that improper inflation to the musical work rate. The Board concluded that this problem "can be avoided by reducing the TCC percentage"[17] from the 40 percent implied by Professor Gans' 2.5:1 ratio. Specifically, the Judges concluded that "the TCC percentage should be reduced to a level that produces the same (non-complementary-oligopoly) percentage revenue rate when applied to the existing [redacted]% combined royalty as the Shapley-produced TCC percentage yields when applied to the theoretical combined royalties in the model."[18]

17. To make this correction, the *Final Determination* uses the following formula:

$$TCC = 1 \div ((R_t/R_{mw}) - 1)$$

"where R_t is the combined royalty rate in the marketplace ([redacted]%), and R_{mw} is the musical work royalty rate yielded by the Shapley value analysis."[19] The formula states that the adjusted TCC rate should be the inverse of the ratio of actual royalty rates in the market to the musical works rate calculated based on the Shapley analyses (15.14 percent), minus one. As it turns out, [redacted]

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[16] *Final Determination* at 73.

[17] *Final Determination* at 73.

[18] *Final Determination* at 73. The "existing" combined royalty rate of [redacted] percent [redacted] "actual combined royalties for musical works and sound recordings" as a percentage of revenue.

[19] *Final Determination* at 73, n. 135.

percent divided by 15.14 percent equals [redacted] equals 26.2 percent.[20]

18. As I explain in the following section, the important point for the present purpose is that the 26.2 percent TCC rate is derived from the 15.1 percent percentage of revenue rate, not the other way around.

B. Substituting the Adjusted TCC Rate Ratio Would Make the Working Proposal's Methodology for Determining a Percentage of Revenue Rate Inconsistent with the Final Determination

19. In the *Additional Materials Order* the Judges put forward a potential approach to calculating a percentage of revenue rate that they are considering adopting in place of the method used to calculate the percentage of revenue rate in the *Final Determination*. The *Additional Materials Order* explains that the Working Proposal would begin by adopting "the Shapley Value allocations the Majority determined previously," and states that "the [sound recording to musical works royalty] ratio adopted by the Majority in the determination under review was 3.82:1, reflecting a TCC rate of 26.2%."[21]

20. As shown above, no Shapley analysis generated a 3.82:1 ratio of sound recording to musical work royalties. To the contrary, as shown in the figure from page 75 of the *Final Determination* which I reproduced above, the Shapley analysis ratios the Board identified ranged from [redacted], and the Board selected 2.5:1. Figure 2 juxtaposes this Working Proposal assumption with the analysis in the *Final Determination*, showing that the Working Proposal

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[20] One way of comprehending the intuition here is to note that 26.2 percent times the sound recording royalty percentage implied by a [redacted] percent actual combined royalty rate and a 15.1 musical works rate (that is, [redacted]) also equals 15.1 percent of revenues. Thus, the effect of the 26.2 percent TCC rate is to equate the royalties musical works holders would get from the TCC prong to the royalties they would get from the percentage of revenue prong, assuming that actual combined royalties are [redacted] percent. Thus, if percentage of revenue royalties were to fall below 26.2 percent of sound recording royalties, the True TCC prong would kick in and serve, as intended, as a floor on musical works royalties.

[21] *Additional Materials Order* at 2.

would effectively add a new row to the Board's table, showing a 3.82:1 ratio which is not within the range of Shapley analysis-based ratios considered by the Judges in the *Final Determination*.[22]

FIGURE 2:
COMPARISON OF WORKING PROPOSAL RATIO
WITH SHAPLEY RATIO TABLE FROM *FINAL DETERMINATION*
Implied Musical Work Royalty (% of revenue) Based on Ratio and Total Royalties[130]

[redacted]

Sources: Final Determination at 72; Additional Materials Order at 3, Point 7. Note: Red lines and yellow highlighting added.

21. Given that the 3.82:1 ratio comes from the 26.2 percent TCC rate, which is generated by the 15.1 percent percentage of revenue rate, as an economic matter, there is no basis for using it in place of the 2.5:1 ratio established by the Judges in the *Final Determination* to generate a new percent of revenue rate.

22. when used with the 2.5:1 Shapley ratio, the Working Proposal is consistent with the *Final Determination*. The Working Proposal's formula is arithmetically identical to the formula used to calculate the 15.1 percent percentage of revenue rate in the *Final Determination*, except that it uses a 3.82:1 ratio instead of 2.5:1 and a not-yet-determined Combined Royalty Rate instead of Professor Marx's [redacted] percent.[23]

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[22] For these reasons, a Working Proposal that utilizes a 3.82:1 ratio would also likely be inconsistent with the 801(b) Factors B and C. *See* 17 U.S.C. § 801(b)(1)(A)-(D) (2017). As the Judges indicated, the parties' economic experts agreed on the propriety of evaluating Factors B and C through Shapley analysis. *See Final Determination* at 86. While a proposal cannot be fully evaluated under the 801(b) factors without knowing the details of the rate structure, rates and terms, the use of a share ratio that was not consistent with the Shapley analyses would not support the *Final Determination's* findings with respect to Factors B and C.

[23] The Working Proposal uses the formula $x + 0.262x = 0.68$, where x is the sound recording rate, $0.262x$ is the musical work rate, and 0.68 is a hypothetical Combined Royalty Rate ("calculated as 1.00 [all the royalty revenue] - .32 [the record companies' assumed concession of royalty revenue required for the Services' survival]"). This formula simplifies and generalizes to a sound recording rate x = Combined Royalty Rate / 1.262, and a musical work

III. THE RECORD SUPPORTS THE USE OF A COMBINED ROYALTY RATE HIGHER THAN [redacted] PERCENT

23. In the *Additional Materials Order*, the Judges explain that they have determined not to rely on the [redacted] percent Combined Royalty Rate from Dr. Marx's Shapley analysis and seek input from the parties on the appropriate rates to use instead.[24] They note that "the extant record contains evidence and testimony that may support a range of various potential findings as to the percent of royalties the Majors allow the interactive service sector to retain," which they conclude "is a market-derived data point."[25] They also "invite[] the parties…to reference particular percentages in the record and explain, through witnesses and/or argument, as appropriate, why they believe those particular percentages are appropriate or inappropriate for use in this regard."[26] Further, they ask parties to address specifically "how the record companies' complementary oligopoly power should or should not affect the Judges' consideration of the rates and rate structure."[27]

24. The first subsection below presents my assessment of record benchmark evidence relating to the Combined Royalty Rate. The second subsection explains why in my opinion it is not appropriate to reduce royalty rates to correct for "complementary oligopoly power" (or any other form of record company market power), and why it would therefore be economically appropriate

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rate = 0.262x = 0.262 × (Combined Royalty Rate / 1.262). *See Additional Materials Order* at 3, Point 7. The *Final Determination* used the formula $R_{mw} = R_t \div (1 + r)$ "where R_{mw} is the musical work royalty rate, R_t is the combined royalty rate for musical works and sound recordings, and r is the ratio of sound recording to musical work royalties." *See Final Determination* at 72, n. 130. Because 0.262 is simply the inverse of the 3.82:1 ratio, it can be represented as 1 / 3.82, which is 1 / r in the notation of the *Final Determination*. Using this notation and representing the musical works rate as R_{mw} and the Combined Royalty Rate as R_t, as in the *Final Determination*, the Working Proposal formula is $R_{mw} = \frac{1}{r} \times \frac{R_t}{1+\frac{1}{r}} = \frac{R_t}{r+\frac{r}{r}} = \frac{R_t}{1+r} = R_t \div (1 + r)$. Therefore, the formulas for the musical work rate in the Working Proposal and *Final Determination* are equivalent with the exception of the inputs for the sound recording to musical work ratio and Combined Royalty Rate.

[24] *Additional Materials Order* at 2, Point 2, n. 2 and 3, n. 5.

[25] *Additional Materials Order* at 2, Point 3.

[26] *Additional Materials Order* at 2, n. 2.

[27] *Additional Materials Order* at 2, Point 2.

for the Judges to adjust both the percentage of revenue rate and the TCC rate upwards based on a Combined Royalty Rate reflective of the actual marketplace.

A. Record Evidence Reflects Combined Royalty Rates of More Than 70 Percent

25. The Additional Materials Order states that:

> [T]he Judges do not find it appropriate to include in their analysis Professor Marx's assumption that the Services should retain 47% of the revenue generated by streaming, and the mechanical works royalty rate in the Judges' contemplated approach accordingly is higher than under Professor Marx's approach.)[28]

26. The Services retaining 47 percent of revenue corresponds to Professor Marx's theoretical [redacted] percent Combined Royalty Rate, which, as described above, was an input into the formula that calculated the 15.1 percent of revenue rate. Therefore, as noted in the *Additional Materials Order*, any decrease in the percentage of revenue retained by the Services below 47 percent, and hence any increase in the Combined Royalty Rate above [redacted] percent, will result in a higher musical works royalty rate. Further, for the reasons I explained above, the impact of a higher Combined Royalty Rate should be calculated by applying the formula used in both *Final Determination* and the *Additional Materials Order*[29] based on the *Final Determination's* finding of a 2.5:1 sound recording to musical works ratio.

27. In my direct and rebuttal testimony, I observed that the industry standard split of revenues between rightsholders and Services is approximately 70/30, with 70 percent going to rightsholders

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[28] *Additional Materials Order* at 3, n. 5.

[29] As I explained above, the two formulas are mathematically identical.

and 30 percent being retained by Services.[30] For example, as noted in my rebuttal testimony,[31] Spotify's general counsel Horacio Gutierrez has confirmed publicly that Spotify pays a Combined Royalty Rate of over 70 percent, and stated explicitly that this is "as it should be":

> Most people do not realize that over 70% of all the revenue Spotify generates goes back to the creative community that owns the right to the music content that we distribute through our service; artists, songwriters, record labels, publishers. That's as it should be.[32]

28. The record evidence supports Mr. Gutierrez's statement, showing that Spotify's historical Combined Royalty Rate is [redacted] percent; indeed, as explained above, [redacted].

29. Similarly, when Apple Music launched, Apple announced that it would pay 71.5 percent of revenue to rightsholders, implying that Apple would retain 28.5 percent.[33]

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[30] Eisenach WDT at ¶¶168, 171 ("I note that it is accepted, and indeed publicly proclaimed by some services, that services pay approximately 70 percent of revenue to rightsholders – which in the case of interactive streaming means simply two groups: publishers/songwriters and labels.... [T]he industry standard [is] that approximately 70 percent of service revenue is allocated to rightsholders."); Eisenach WRT at ¶79 ("Further evidence that the rates found in the interactive streaming agreements for sound recordings are not artificially high due to the lack of effective competition among the record companies comes from the fact that interactive streaming services, such as Spotify, enjoy a standard split of revenues – roughly 70/30 in favor of copyright owners."). *See also Clarification Order* at 9 ("Copyright Owners seek information regarding the evidentiary source of any such actual percentage divisions of revenue between interactive services, on the one hand, and both classes of copyright holders, on the other. In response, the Judges first note that one of Copyright Owners' expert economic witnesses, Dr. Jeffrey Eisenach, testified that '[t]he industry standard [is] that approximately 70% of service revenue is allocated to rightsholders ....' Trial Ex. 3027 ¶ 171 (Eisenach WDT). Again, arithmetically, that would mean the 'industry standard' per Dr. Eisenach is that 30% of the revenue generated by interactive streaming would be retained by the interactive services (rather than the 32% hypothetical figure in the Working Proposal). *See also* Trial Ex. 3033 ¶ 79 (Eisenach WRT) ('interactive streaming services, such as Spotify, enjoy a standard split of revenues — roughly 70/30 in favor of copyright owners').").

[31] Eisenach WRT at ¶79.

[32] Hearing Exhibit 2745, Loren Shokes, *Interview with Spotify General Counsel Horatio Gutierrez*, Harvard Journal on Sports & Entertainment Law (Dec. 19, 2016), http://harvardjsel.com/2016/12/interview-with-spotify-general-counsel-horacio-gutierrez/.

[33] Eisenach WDT at ¶168 ("At the time of the launch of Apple Music, Apple stated that it will pay 71.5 percent of its streaming revenues to rightsholders in the United States.") (citing Hearing Exhibit 2835, Paul Resnikoff, "Apple Responds: 'We Pay 71.5 Percent of Streaming Revenue Back to Artists…'," *Digital Music News* (June 15, 2015) (*available at* http://www.digitalmusicnews.com/2015/06/15/apple-responds-we-pay-71-5-percent-of-streaming-revenue-back-to-artists/) (last accessed Oct. 12, 2016); Hearing Exhibit 2839, Sai Saichin R, "Apple to Pay 70 Percent of Music Subscription Revenue to Labels, Publishers," *Reuters* (June 15, 2015) (*available at* http://www.reuters.com/article/us-apple-music-idUSKBN0OV1VX20150615) (last accessed Oct. 12, 2016).).

30. Moreover, since the time of these statements, the streaming market has grown substantially, meaning that these Services have increased economies of scale, which is associated with lower service costs as a percentage of revenue.[34]

31. In addition to the evidence presented above, my written rebuttal testimony in this Remand proceeding contains an analysis of Combined Royalty Rates paid by the four Services (Amazon, Google, Pandora and Spotify) prior to and during the P3 Rate Activity Period (January 2018 through September 2020). That analysis showed that in 2017, prior to the *Phonorecord III* rates taking effect, these services paid a Combined Royalty Rate of [redacted] percent of revenue and that from 2018 through the end of the P3 Rate Activity Period the Combined Royalty Rate [redacted] percent.[35] This range of a [redacted] percent Combined Royalty Rate corresponds to percentage of revenue rates between [redacted] percent. In my opinion, [redacted] Combined Royalty Rate during the P3 Rate Activity Period should be given less weight or adjusted upwards, for at least two reasons. First, much of [redacted] is endogenous to this rate setting process. In particular, (i) the *Phonorecords III* rates were phased in over five years and so these first years [redacted], and (ii) the student and family plan discount terms [redacted]. Second, as I demonstrated in detail in my RWRT,[36] the extent

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[34] *See, e.g., Final Determination* at 88, n.161

[35] Eisenach RWRT at ¶13.

[36] Eisenach RWRT at ¶¶15-16 ("I do not believe that measuring royalties as a percentage of Service Provider Revenue is a reliable yardstick for fairness or reasonableness from the perspective of copyright owners…. The royalty data I examined contain multiple examples of instances in which changes in royalties measured as a percentage of Service Provider Revenue do not in any meaningful economic sense relate to the level of royalties being paid, but rather to the volitional business practices of the Services regarding discounting and other factors unrelated to the value of the licenses."); Eisenach RWRT at ¶6 ("The evidence also shows that the Services' incentives and ability to engage in revenue deferral, displacement and bundling are increasing, such that the revenues attributable to interactive streaming services continue to understate the contribution of copyrighted material to their profits and enterprise values."); Eisenach RWRT at ¶99 ("The reality and risk of revenue displacement in now omnipresent in an industry where it once was not a primary concern.").

of revenue deferral and displacement engaged in by the Services has increased as the Services have increasingly utilized their music streaming services as a means of acquiring and retaining customers for their growing platform businesses.[37]

32. My rebuttal testimony also provides a robustness check on the appropriateness of using these actual splits between content creators and interactive streaming distributors in the range of "70/30," as shown in the record. I explain that this same general ratio "is found in many other markets in which digital content is distributed to users."[38] For example, I showed that Apple iTunes and Netflix paid 70 percent of revenue to rightsholders, retaining 30 percent, and Hulu paid more than 71.4 percent, retaining less than 28.6 percent.[39] Taken together, this benchmark record

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[37] *See also Final Determination* at 21 ("The Judges find that the record in this proceeding indicates that the Services do seek to engage to some extent in revenue deferral to promote a long-term growth strategy. A long-term strategy that emphasizes scale over current revenue can be rational, especially when a critical input is a quasi-public good. Growth in market share and revenues is not matched by a commensurate increase in the cost of inputs, whose marginal cost of production (reproduction in this context) is zero. It appears to the Judges that the nature of the downstream interactive streaming market and its reliance on scaling for success, results necessarily in a competition for the market rather than simply competition in the market. This competition emphasizes the importance of the dynamic creation of new markets and 'new demand curves,' recognizing that short-term profit or revenue maximization might be inconsistent competing for the market long-term. When the Services pay royalties as a percent of their current revenue, the input suppliers, i.e., Copyright Owners, are likewise deferring some revenue to a later time period and assuming some risk as to the ultimate existence of that future revenue. One way the Copyright Owners could avoid this impact would be to refuse to accept a percent-of-revenue form of payment and move to a fixed per-unit price. Another way would be to establish a pricing structure that provides minima and floors, below which the revenue could not fall."); *Final Determination* at 36 ("Revenue deferral argues against adopting a pure percent-of-revenue rate structure."); U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III), Dissenting Opinion of Judge David R. Strickler*, Docket No. 16-CRB-0003-PR (2018-2022) (November 5, 2018) (hereafter "*Dissenting Opinion*") at 59-60.

[38] Eisenach WRT at ¶79.

[39] Eisenach WRT at ¶79 ("[I]n its 2016 10-K, Netflix reported total streaming revenues in 2015 of about $6.1 billion (domestic and international) with associated content costs (costs of revenues) of about $4.3 billion, and revenues in 2016 of about $8.3 billion with associated content costs of about $5.8 billion, reflecting a rate, in both years, of approximately 70 percent for content costs. This same split is found in other services, such as Hulu, another popular video streaming service, and it is well known that Apple's agreements with record labels (and app developers) typically give 70 percent of every digital track sale to the rights holders, with 30 percent going to Apple."); Hearing Exhibit 855, Steve Knopper, *The New Economics of the Music Industry*, Rolling Stone (Oct. 25, 2011), http://www.rollingstone.com/music/news/the-new-economics-of-the-music-industry-20111025 ("Apple, as the retailer, keeps 30 percent."); Hearing Exhibit 2820, Jennifer Van Grove, *Embrace the Mushy Mush! Hulu's 2012 Numbers Are a Mixed Bag*, Venture Beat (Dec. 17, 2012), http://venturebeat.com/2012/12/17/hulu-2012/ (showing that Hulu had estimated revenue of just below $700 million in 2012 and "spent more than $500 million on content deals"; $500 million / $700 million = 71.4 percent).

evidence reflects Combined Royalty Rates between 70 percent and [redacted] percent, implying that the Services would retain between [redacted] percent and 30 percent.

33. Table 1 shows the musical work royalty rate as a percent of revenue implied by Combined Royalty Rates found in benchmark record evidence and the 2.5:1 ratio adopted by the Board in the *Final Determination*. The implied musical works rate ranges from [redacted] percent to [redacted] percent.

TABLE 1:

[redacted]

34. Equally important, the existence of revenue deferral and displacement suggest that the Combined Royalty Rate chosen should be at the higher end of the reasonable range of rates.[40] As shown in my remand rebuttal testimony, cases of extreme revenue diminution are not uncommon, including where services have negotiated licenses in the free market that produce royalty rates equivalent to more than [redacted] percent of Service Provider Revenue as defined in 37 CFR Part 385.[41] The reasoned economic conclusion from such service agreements is that Service Provider Revenue does not capture the true economic value of musical rights to the services, as no market actor would agree to pay costs that were in fact [redacted] the economic benefits they receive.

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[40] As discussed further below, the reality of revenue diminution also indicates the importance of having strong alternative rate prongs to ensure delivery of proper royalties, including a True TCC rate prong and usage-based metrics such as per-subscriber and per-play rate prongs.

[41] Eisenach RWRT at Figure 3, ¶¶ 85-89, Figure 19.

B. The Complementary Oligopoly Theory Does Not Support a Lower Rate

35. As noted above, the *Additional Materials Order* specifically seeks input from the parties on "how the record companies' complementary oligopoly power should or should not affect the Judges' consideration of the rates and rate structure."[42] In my opinion, the complementary oligopoly power theory does not provide a useful framework for assessing whether rates paid by the Services are effectively competitive, and should not affect the Judges' consideration of the rates and rate structure.

36. First, as I have noted previously, the market for musical works rights is a bargaining market in which prices and terms are negotiated.[43] The complementary oligopoly theory, on the other hand, is grounded in the assumption of an arms-length market in which sellers are "price setters" and buyers are "price takers." Simply put, the analytical framework that underlies the complementary oligopoly theory does not apply to bargaining markets and is not informative of how to set rates in the market for musical works rights.[44]

37. Second, a careful examination of the metrics that affect the economic reasonableness of negotiated rates in the bargaining market between record labels and services demonstrates that record labels do not currently possess the bargaining power necessary to impose rates that are higher than those that would prevail under effective competition. While it is certainly true that the

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[42] *Additional Materials Order* at 2, Point 2.

[43] Eisenach WRT at ¶76 ("While the workable competition framework can provide useful insights in markets where sellers have market power and buyers are price takers, the more appropriate framework for assessing outcomes in markets – like the markets for many of the potential benchmarks put forward in this proceeding – in which both buyers and sellers have a degree of market power, and where prices are determined through negotiations, is a game-theoretic 'bargaining power' model.").

[44] These issues were also addressed in detail in the Remand Written Rebuttal Testimony of Daniel Spulber. *See* Daniel Spulber, *In the Matter of Determination Rates and Terms for Making and Distributing Phonorecords (Phonorecords III), Remand Written Rebuttal Testimony of Daniel F. Spulber, Ph.D.*, Docket No. 16-CRB-0003-PR (2018-2022) (Remand) (July 2, 2021).

concept of "workable" or "effective" competition is inherently ambiguous, the central concept of "effective competition" is that prices and quantities are sufficiently close to the prices and quantities that would prevail in a competitive market that economic efficiency is not substantially impaired. All of the evidence in this proceeding points to the fact that the market for music streaming is growing rapidly, and, further, demonstrates that the economic returns to music streaming are sufficiently high to generate continuing investment and new entry.[45] Such rates are *prima facie* "effectively competitive."[46]

IV. THE EVIDENCE DOES NOT SUPPORT REMOVING OR "CAPPING" THE TRUE TCC PRONG, WHICH PLAYS AN IMPORTANT ROLE IN DELIVERING FAIR ROYALTIES

38. The *Additional Materials Order* raises the possibility of eliminating the True TCC prong, stating that "the Judges are considering…the elimination of the separate 'greater of' TCC rate prong included in the Final Determination."[47] The True TCC prong plays an important role in

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[45] *See* Eisenach WDT at ¶53 ("The continued entry of new services into the interactive streaming business demonstrates that investors and entrepreneurs expect to earn economic profits – i.e., returns in excess of the risk-adjusted return on capital – from their investments. To be clear, this does not necessarily mean that: (a) these firms are earning accounting profits, which are different from economic profits; (b) these firms are currently earning economic profits or expect to do so in the immediate future; or, (c) all of these firms will earn profits (of any kind). What it does mean is that many investors believe the risk-adjusted expected rate of return exceeds the cost of capital or, in economic terms, that at current and anticipated prices and market conditions – including the rates and terms for acquiring copyright licenses – the digital music streaming business is profitable."); Eisenach WRT at ¶¶83-102.

[46] Recent findings by the Judges in another proceeding supports evolution on this question away from reducing royalties based on theories of complementary oligopoly. In the Web V determination, the Judges found that Spotify had "countervailing power" which "could and did blunt some of the Majors' complementary oligopoly power, [redacted] toward an effectively competitive rate." U.S. Copyright Royalty Judges, *In re Determination of Rates and Terms for Digital Performance of Sound Recordings and Making of Ephemeral Copies to Facilitate Those Performances (Web V)*, *Initial Determination*, Docket No. 19-CRB-0005-WR (2021-2025) (June 11, 2021) at 66 (hereafter, "*Web V*").. Among the Judges' findings was that, "the point of complementary oligopoly power is that a 'Must Have' supplier/licensor [redacted] to its buyers/licensees. And yet, here the Services acknowledge that the Spotify-Major negotiations were marked by a [redacted], as happens in *any* negotiation." *Id.* at 65. *See also id.* at 63 ("Spotify's subscription royalty rate is [redacted] set through the exercise of complementary oligopoly power alone."). While the Judges nevertheless determined to impose a 12 percent "effective competition" adjustment in that proceeding (*Web V* at 67), [redacted] through a "countervailing power offset" (*Web V* at 72), and in either event is far smaller than the [redacted] percent reduction to the percent of revenue rate or the [redacted] percent reduction to the TCC rate implemented by the use of Prof. Marx's [redacted] percent Combined Royalty Rate instead of the [redacted]% actual combined royalty rate in the marketplace.

[47] *Additional Materials Order* at 4, Point 10.

protecting against revenue deferral, displacement and anomalous reporting practices, and thus delivering royalty payments that reasonably reflect the economic contributions of musical works rights to the services. The economic significance of the True TCC prong is highlighted by the amount of royalties that would be lost without its operation, as discussed below.

39. Further, record company contracts [redacted] by comparison to the five-year term of the rates set by the Judges, reflecting the fact that market-based music licensors [redacted] in order to react to the highly dynamic nature of the music marketplace – a reaction that cannot be replicated by the Judges due to statutory limitations. Regulatory lag can have dramatic consequences in a proceeding, such as this, that begins seven years before the end of its rate period. The TCC rate is essential to protecting against that regulatory lag because it adjusts to market changes throughout the term.

40. The record evidence in this proceeding demonstrates that the True TCC prong has performed its function of limiting the unintended consequences of regulatory lag. That is, over the past four years, the TCC rate has *in fact* protected against changes in the marketing and accounting practices of the Services that would have significantly reduced the royalty pool.

41. Specifically, in my remand rebuttal testimony I demonstrated in detail that during the P3 Rate Activity Period the True TCC rate prong "served its intended purpose by protecting Copyright Owners against the Services' revenue diminution strategies as well as from apparently anomalous reporting practices."[48] There, I reviewed monthly royalty statement information from Amazon, Google, Pandora, and Spotify, covering their various offerings and dating from the launch of Section 115 activities by each of them, and assessed the impact of the True TCC prong on the

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[48] Eisenach RWRT at ¶68.

royalties paid.[49] For example, as I explained in detail, I found that the True TCC prong was essential in [redacted].[50] My analysis also showed that the True TCC prong played an important role in protecting against anomalous reporting practices, such as [redacted].[51]

42. Importantly, my analysis of the impact of the True TCC prong was not prospective, but rather relied on actual royalty data for the relevant period. Thus, it does not represent conjecture or even an economic forecast, but rather a straightforward comparison of royalties that will actually be paid by the Services if the True TCC prong remains in place versus royalties that will be paid if it does not. By removing the True TCC prong, in other words, the Judges would be directly imposing reductions in royalties caused by revenue deferral, displacement and anomalous reporting, such as and including the specific instances identified in my report.

43. While the royalty protection provided by the True TCC prong is proven in these examples, assessing the overall impact of removing the True TCC prong depends upon the terms around it. In the absence of knowing the final percent of revenue rate, per-subscriber rates, discount plan terms, revenue definitions and more, one cannot calculate with precision what the full impact is of

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[49] *See* Eisenach RWRT at Section III.
[50] Eisenach RWRT at ¶¶69-72.
[51] Eisenach RWRT at ¶¶73-77.

eliminating the TCC prong. However, to provide a baseline for assessment, I examined the scenario of removing only the TCC prong from the *Final Determination* rates and terms, while leaving all other rates and terms in place. I analyze what the impact would be on mechanical royalties across the five-year *Phonorecords III* period. To do this, I rely upon the same dataset used in my remand rebuttal testimony in this matter,[52] which includes the historical royalty data for all four of the Services (and not Apple). I use that historical data to calculate royalty payments for the entire *Phonorecords III* rate period, January 2018 - December 2022 (using historical data to create estimates for the remaining portion of the rate period).[53] Finally, I do the same while dropping the True TCC rate prong from the calculations. The impact is substantial. Removing only the TCC prong while leaving the rest of the *Phonorecords III* rates and terms intact is estimated to reduce musical work royalties by approximately [redacted] from just the four Services.[54] I emphasize that this estimate understates the overall impact, since it applies only to the four Services for which data are available, and omits reductions in royalties due from Apple (and every other service). Again, estimating with precision the overall impact requires knowledge of the full rate structure, rates and terms, but this analysis indicates that the impact of eliminating the TCC prong could be very substantial.

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[52] *See* Copyright Owners' Remand Exhibits A-D; Eisenach RWRT at Appendix C.

[53] I do so by calculating the compounded monthly growth rates for the period September 2019 – September 2020 separately for each market activity measure. I then apply those rates to the most recent month of data available for each offering to calculate monthly activity measures through December 2022. As a robustness check, I performed the same calculation using a more disaggregated forecast methodology which, instead of forecasting market activity growth separately by market activity measure, does so by both market activity measure and by offering type: full, limited, or free/ad-supported. (Full offerings include Amazon Music Unlimited Individual, Family, and Student; Amazon Music Unlimited Bundle; Amazon Music Unlimited Home; Google YouTube SVOD; Pandora Premium; Spotify Premium; Spotify Bundled; and Spotify Non-Portable. Limited offerings include Amazon Cloud Player, Amazon Prime Music, and Pandora Plus. Free/ad-supported offerings include Amazon Ad-Supported Stations Tier, Google YouTube AVOD, Pandora Premium Access, and Spotify Free.) This alternative calculation indicated removal of the TCC prong would reduce royalties over the five-year period by [redacted].

[54] This model includes the mechanical-only per-subscriber rate prongs (the "mechanical floors"), which did not protect against the identified reduction in royalties.

44. Importantly, a multi-prong structure is also economically reasonable. The economic purpose of any negotiated pricing structure is to ensure that the fees actually paid reflect as closely as possible the intention of the parties in agreeing to the bargain. Thus, for example, revenue-based pricing structures are appropriate if the value of the bargain to each party is reasonably reflected in the revenues earned through the use of the input, and if that relationship can be expected to remain steady over time. On the other hand, if the relationship between revenues and value is unstable – for example, if the potential for the buyer to realize complementary benefits is increasing, such that the value of the bargain (to the buyer) could increase without a commensurate growth in cognizable revenues – then the utility of revenues as a proxy for value is diminished. The same logic applies to other potential measures of value, such as the number of customers (or, in this case, subscribers) associated with the downstream product or the amount of the input used (in this case, the number of plays). In such circumstances, the parties may logically agree to structures that incorporate multiple proxies for value in order to reduce the risk that any single proxy will prove unstable – and thus fail to reflect the intended value of the bargain.

V. CONCLUSION

45. For all of the reasons I have explained above, any implementation of the Working Proposal should utilize the 2.5:1 ratio and Combined Royalty Rates in the range of 70 percent or higher, royalty rates should not be reduced on theories about record company market power, and the TCC prong should not be capped or eliminated.

I, Jeffrey A. Eisenach, declare under penalty of perjury that the statements contained herein are true and correct to the best of my knowledge, information and belief. Executed on January 24, 2022 in OAKTON, VIRGINIA.

Jeffrey A. Eisenach

APPENDIX A

Materials Relied Upon

Legal Documents

17 U.S.C. § 801(b)(1)(A)-(D) (2017).

Jeffrey Eisenach, *In the Matter of Determination Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Written Direct Testimony of Jeffrey Eisenach, Ph.D.*, Docket No. 16-CRB-0003-PR (2018-2022) (October 31, 2016).

Jeffrey Eisenach, *In the Matter of Determination Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Written Rebuttal Testimony of Jeffrey Eisenach, Ph.D.*, Docket No. 16-CRB-0003-PR (2018-2022) (February 13, 2017).

Jeffrey Eisenach, *In the Matter of Determination Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Supplemental Written Rebuttal Testimony of Jeffrey Eisenach, Ph.D.*, Docket No. 16-CRB-0003-PR (2018-2022) (March 1, 2017).

Jeffrey Eisenach, *In the Matter of Determination Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Remand Written Rebuttal Testimony of Jeffrey Eisenach, Ph.D.*, Docket No. 16-CRB-0003-PR (2018-2022) (Remand) (July 2, 2021).

Johnson v. Copyright Royalty Bd., 969 F.3d 363 (D.C. Cir. 2020).

Daniel Spulber, *In the Matter of Determination Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Remand Written Rebuttal Testimony of Daniel F. Spulber, Ph.D.*, Docket No. 16-CRB-0003-PR (2018-2022) (Remand) (July 2, 2021).

U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Final Determination*, Docket No. 16-CRB-0003-PR (2018-2022) (November 5, 2018).

U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Dissenting Opinion of Judge David R. Strickler*, Docket No. 16-CRB-0003-PR (2018-2022) (November 5, 2018).

U.S. Copyright Royalty Judges, *In the Matter of Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Order Regarding Proceedings on Remand*, Docket No. 16-CRB-0003-PR (2018 – 2022) (Remand) (December 15, 2020).

U.S. Copyright Royalty Judges, *In re Determination of Rates and Terms for Digital Performance of Sound Recordings and Making of Ephemeral Copies to Facilitate Those Performances (Web V)*, *Initial Determination*, Docket No. 19-CRB-0005-WR (2021-2025) (June 11, 2021).

U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Notice and Sua Sponte Order Directing the Parties to Provide Additional Materials*, Docket No. 16-CRB-0003-PR (2018-2022) (Remand) (December 9, 2021).

U.S. Copyright Royalty Judges, *In re Determination of Royalty Rates and Terms for Making and Distributing Phonorecords (Phonorecords III)*, *Order Granting in Part and Denying in Part Copyright Owners' Motion for Reconsideration or, in the Alternative, Clarification*, Docket No. 16-CRB-0003-PR (2018-2022) (Remand) (January 6, 2022).

<u>News Articles Cited</u>

Paul Resnikoff, "Apple Responds: 'We Pay 71.5 Percent of Streaming Revenue Back to Artists…'," *Digital Music News* (June 15, 2015) (available at http://www.digitalmusicnews.com/2015/06/15/apple-responds-we-pay-71-5-percent-of-streaming-revenue-back-to-artists/).

Sai Saichin, "Apple to Pay 70 Percent of Music Subscription Revenue to Labels, Publishers," *Reuters* (June 15, 2015) (available at http://www.reuters.com/article/us-apple-music-idUSKBN0OV1VX20150615).

TAB D

Before the
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In re DETERMINATION OF ROYALTY RATES AND TERMS FOR MAKING AND DISTRIBUTING PHONORECORDS (Phonorecords III)	Docket No. 16–CRB–0003–PR (2018–2022) (Remand)

ADDITIONAL WRITTEN DIRECT TESTIMONY OF DANIEL F. SPULBER, Ph.D.

Expert Witness for Copyright Owners

Submitted January 24, 2022

OVERVIEW OF REPORT

1. My name is Daniel F. Spulber. I submitted Remand Written Rebuttal Testimony ("RWRT") in this proceeding on July 2, 2021. Below I include a section of my RWRT that was struck as not being rebuttal testimony in the Judges' Order dated October 1, 2021. This section relates directly to a question that has now been posed by the Judges in their Order dated December 9, 2021 (page 2), namely, "how the record companies' complementary oligopoly power should or should not affect the Judges' consideration of the rates and rate structure." The section provided again below should be considered alongside the other sections of my RWRT, including the discussion of how record company licenses are established through negotiation. My qualifications are described in my RWRT.

2. The Judges' reconsideration of this topic is welcome. Insofar as the term "complementary oligopoly" is used as I describe it in Paragraph 6 below, a conclusion that the Major record companies are complementary oligopolists in the upstream interactive streaming market would be a very extreme economic finding. As discussed below, this market has virtually none of the characteristics of a Cournot complementary oligopoly, and we see no empirical evidence of Cournot effects in the market. The Judges' reexamination of this question should insist on meticulous economic analysis and empirical proofs from any witness advancing that this market fits the Cournot model, a precise mathematical logic model that depends on specific conditions which are not seen in this market. Given the incompatibility of the economic theory with the empirical facts of the market, my opinion is that concerns of "complementary oligopoly power"[1] should not affect the consideration of rates and rate structure.

THE ECONOMICS OF BARGAINING SHOWS THAT THE RECORD COMPANIES ARE NOT A COMPLEMENTARY OLIGOPOLY

3. Each of the Services' expert witnesses makes reference to a "complementary oligopoly" among record companies. (*E.g.*, Katz WDRT ¶53; Marx WDRT ¶39; Leonard WDRT ¶13)

[1] As I discuss below, being in a complementary oligopoly is a curse, not a power. It reduces gains for everyone, and record companies would seek to end one if it existed. This partly explains why complementary oligopoly effects are rarely seen in the real world.

None of these witnesses provide any economic explanation for how this supposed status changes market outcomes or what it would mean for the compulsory mechanical royalty rate, but each expert witness seems to think that it helps their argument for lower compulsory mechanical royalties. My reading of the Final Determination is that it does in fact account for a large reduction to the royalty rates due to a concern for this same complementary oligopoly. (Final Determination at 73) Given the apparent appeal by the streaming services for changes to the rate structure and rates discounts based on this same concern, I address it below.

4. With respect to the analysis of sound recording royalties in the free market, there are two conflicting views that I will call the complementary oligopoly view and the negotiation view. These two views have different implications for how to analyze sound recording royalties.

5. The negotiation view recognizes that record companies and streaming services negotiate sound recording license agreements that include royalties and other contract provisions. The complementary oligopoly view, in contrast, asserts that record companies do not negotiate with streaming services but rather dictate royalties through take-it-or-leave-it offers that offer no earnings for streaming services.

6. The analysis in this section concludes that the record companies are not a complementary oligopoly. A complementary oligopoly is said to be subject to the following problem: "[b]y logic first identified by Antoine Cournot in 1838, firms offering complementary products tend to set higher prices than would even a monopoly seller of the same products, illustrating that suppliers of complements do not compete with one another." (*Web IV* Final Determination, 81 Fed. Reg 26342) The reasoning behind the Cournot model is that each supplier raises their price without regard to the negative effects on the profits of other suppliers, resulting in total prices that are higher than a bundling monopolist and profits that are lower than a bundling monopolist.[2] This problem is known to economists as the "Cournot Effect" or the complements

[2] See Antoine Augustin Cournot, Researches Into the Mathematical Principles of the Theory of Wealth, Translated by Nathaniel T. Baker, 1838, 1897, New York: MacMillan; Francesco Parisi and Ben DePoorter, The Market for Intellectual Property: The Case of Complementary Oligopoly in The Economics of Copyrights: Developments in Research and Analysis, 2003 (W. Gordon and R. Watt eds.) ("In the case of complementary duopoly, unlike the

inefficiency problem. Hereafter, I refer to the Cournot model or "complementary monopolies" model as the "complementary oligopoly" model.

7. The "Cournot effect" means that total input prices are greater than what a bundling monopolist would charge.[3] Applying the complementary oligopoly model to the recorded music industry implies that record companies would charge total royalties that are greater than what a bundling monopolist would charge. Because a monopolist maximizes profit, it is apparent that such royalties would cause profits to fall below what a bundling monopolist would obtain. The intellectual property ("IP") holders are made worse off.[4] Thus, under economic theory, complementary oligopoly is not a desirable state for even the oligopolists.

8. In the Cournot model, with two or more input suppliers, because the total of input prices exceeds the bundled monopoly price, total output and total profit for input suppliers are driven below that of a bundling monopolist.[5] Thus, while the Services seem to posit that the record companies' alleged complementary oligopoly position is a benefit to the record companies, to the contrary, it is a harmful trap that record companies and other industry participants would seek to avoid.

9. The complementary oligopoly model predicts that the total prices required by input suppliers exceed the price that a monopolist would charge for the bundle of inputs. The "Cournot Effect" is a type of "free rider problem" because each input supplier is said to choose its price for its own benefit without regard to how the resulting increase in the downstream output price will impact other input suppliers. Cournot observes that "the composite commodity will always be made more expensive, by reason of separation of interests than by reason of the fusion of monopolies. On the other hand, an association of monopolists working for their own

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traditional case of duopoly over substitute goods, both producer and consumer surplus are diminished compared to the alternative monopoly outcome").

[3] See Daniel F. Spulber, Complementary Monopolies and Bargaining, 2017, Journal of Law & Economics, Vol. 60, No. 1, pp. 29-74; Daniel F. Spulber, Antitrust Policy toward Patent Licensing: Why Negotiation Matters, 2021, Minnesota Journal of Law, Science and Technology, Vol. 22, No. 1, pp. 83-161.

[4] Parisi and DePoorter (2003) ("the independent pricing of intellectual property rights from two complementary duopolists likely results in an equilibrium that is worse for both the private parties, and society at large").

[5] See J.M. Buchanan and Y.J. Yoon, Symmetric tragedies: Commons and anticommons, 2000, The Journal of Law and Economics, Vol. 43, No. 1, pp.1-14; Spulber (2017); Spulber (2021).

interest, in this instance will also work for the interest of consumers, which is exactly the opposite of what happens with competing producers."[6]

10. Economic analysis and empirical evidence establish that the record companies are not a complementary oligopoly. The market institutions surrounding sound recording licensing depart substantially from those of the complementary oligopoly model so that economic analysis does not support application of that model. The complementary oligopoly model is based on assumptions that do not correspond to the market for sound recording licensing. Also, predictions of the complementary oligopoly model do not correspond to the market for sound recording licensing; in particular there is no evidence for the predicted Cournot effect.

11. The complementary oligopoly model assumes that input suppliers do not engage in negotiations but rather make take-it-or-leave-it price offers to downstream producers.[7] Applied to the recording industry, this would imply that record companies do not negotiate but instead make take-it-or-leave-it royalty offers to streaming services. However, the remand witness statements of the streaming services admit that they negotiate sound recording license agreements with record companies, which is contrary to an argument that record companies make take-it-or-leave-it royalty offers to streaming services.

12. The complementary oligopoly model assumes that input suppliers exercise all of the market power and that downstream producers have no market power.[8] Suppliers choose prices to maximize their individual profit. Downstream producers take the input supply prices as given and also are price takers in the downstream product market. In the sound recording market, this would imply that record companies have all of the market power and streaming services have no market power. Negotiation of sound recording license agreements and other evidence shows, however, that record companies do not have all of the market power.

13. The complementary oligopoly model describes immediate transactions rather than contractual exchange. This does not accurately describe the sound recording license market

[6] See Cournot (1838, 1897) at p. 103.
[7] See Buchanan and Yoon (2000); Parisi and DePoorter (2003); Cournot (1838, 1897) at pp. 99-116.
[8] See Buchanan and Yoon (2000); Parisi and DePoorter (2003); Cournot (1838, 1897) at pp. 99-116.

because streaming services and record companies transact through contractual agreements that, the remand witness statements admit, cover some period of time, typically years.

14. The complementary oligopoly model also assumes that inputs are combined in fixed proportions to produce a final output. In economic terms, inputs are said to be perfect complements. Cournot's model illustrates this with the example that zinc and copper are combined in fixed proportions to produce brass. Inputs are said to be perfect complements if a producer cannot generate any output without using all of the inputs. In other words, output is zero if any one of the inputs is not used. In contrast to the complementary oligopoly model, the sound recording catalogs of record companies are not perfect complements. It is feasible to operate a music streaming service without obtaining every recording from every record company. For example, Amazon's Prime Music has about two million recordings, in contrast to Amazon Music Unlimited, which has about 60 million recordings, according to Rolling Stone.[9] The catalogs of record companies may be imperfect complements or imperfect substitutes.

15. In the complementary oligopoly model, the final price of brass equals the sum of the prices of copper and zinc weighted by the fixed proportions used in production.[10] This means that downstream producers have a zero markup over their unit costs (also assumed to be zero).[11] So, in the complementary oligopoly model, downstream producers have zero market power in the final output market. In the market for streaming of music, this is equivalent to assuming that streaming services have zero market power vis-à-vis their customers in the market for streaming. However, it is evident that streaming services have some ability to vary their prices and attract customers with differentiated product offerings, brand names, and special features (e.g., subscriptions tied to service-branded products). Streaming services obtain earnings from

[9] Brandt Ran, We Compared Popular Music Streaming Services — These Are the Three You Should Check Out, Rolling Stone (March 12, 2021), available at https://www.rollingstone.com/product-recommendations/electronics/best-music-streaming-services-compared-1011378 ("Prime Music has all of the major features I mentioned above with one caveat: its library 'only' has a couple of million tracks. For reference, the company's paid music subscription service Amazon Music Unlimited gives you access to a library of 60 million songs.").

[10] Cournot (1838, 1897) at p. 100.

[11] Id.

advertising and paid subscriptions, as well as through complementary products and services (such as smart speakers or the exploitation of data acquired from consumers of the streaming service).[12]

16. The just-noted assumption that downstream producers have a zero markup over input costs implies that the complementary oligopoly model assumes that downstream producers are perfectly competitive firms that have zero profit. Applied to the music industry, this is equivalent to assuming that streaming services are perfectly competitive and operate with zero profit. Soaring stock market valuations in this industry strongly suggests that streaming services have high net present values of earnings.[13] This is inconsistent with the assumption of zero profits in the complementary oligopoly model.

17. The complementary oligopoly model also assumes that the input suppliers are monopolists in their respective commodities.[14] This does not provide a description of the market for sound recordings. The recordings produced by record companies are IP. As I point out elsewhere: "The many varieties of competition in the market for inventions and related markets refute the common misconception that patents give their owners an economic monopoly."[15] The same applies to other forms of IP including copyrighted recordings. IP such as copyrights does not confer economic monopolies on copyright owners.[16] IP protections do not create entry barriers into the market for sound recordings. IP protections do not prevent record companies and recording artists from recording new music. The catalogs of recording companies are collections of copyrighted sound recordings. These music catalogs cannot be characterized as monopolized commodities. Because, as noted above, complementary oligopoly is not beneficial

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[12] See RIAA, 2020 Year-End Music Industry Revenue Report, 2020, available at https://www.riaa.com/reports/2020-year-end-music-industry-revenue-report/.

[13] Consider for example the share price history of Spotify on Nasdaq between 2018 and 2021. See Nasdaq.com, "Spotify Technology S.A. Ordinary Shares," Summary, available at https://www.nasdaq.com/market-activity/stocks/spot. (CO Rem. Ex. V).

[14] See Cournot at pp. 100-101.

[15] Daniel F. Spulber, How Patents Provide the Foundation of the Market for Inventions, 2015, Journal of Competition Law and Economics, Vol. 11, No. 2, pp. 271-316; see also Edmund W. Kitch, Elementary and Persistent Errors in the Economic Analysis of Intellectual Property, 2000, Vanderbilt Law Review, Vol. 53, p. 1727.

[16] Kitch (2000) at p. 1727.

to input suppliers, record companies would seek to and do in fact engage in negotiation of sound recording license agreements with streaming services.

18. In particular, recall that negotiation between streaming services and record companies generates a Pareto Optimal outcome. No party to the negotiations can be made better off without making another party worse off. In contrast, the predicted complementary monopolies outcome is not Pareto Optimal. This is because the predicted total royalties are said to be greater than what a bundling monopoly would charge. All record companies could be made better off by lowering the total of royalties at least down to the bundled monopoly level, because then total royalties would generate the greatest amount of profit. Lowering royalties would also make all streaming services better off. So, the predicted complementary monopolies outcome cannot be Pareto Optimal and so it is inconsistent with negotiation.

19. The assertion that the record companies are a complementary oligopoly is also contradicted by Drs. Katz and Marx, who make assumptions in their remand testimony that the record companies have relatively low bargaining power and the streaming services have relatively high bargaining power. Dr. Marx states directly that her adjustments "would yield a substantially lower bargaining power parameter and thus a substantially lower see-saw effect." (Marx WDRT, ¶38) Dr. Katz likewise explains that in the economic formulas, the Greek letter μ is the bargaining power parameter, and that, "μ is also the rate at which the see-saw effect occurs," and that his adjustments would "lead to even lower estimates of μ." (Katz WDRT, ¶¶123, 136)

20. In Cournot's model each of the complementary monopolists chooses its individual profit-maximizing price, and receives exactly that price from its buyers. Cournot defines "the demand for each of the component commodities; if we suppose each of these to be handled by a monopolist."[17] Cournot states that "we shall recognize that the values of p_1 and p_2 are determined by the two equations" for profit maximization.[18] As Machlup and Taber observe, in

[17] Antoine Augustin Cournot, Researches Into the Mathematical Principles of the Theory of Wealth, Translated by Nathaniel T. Baker, 1838, 1897, New York: MacMillan, at pp. 100-01.
[18] Id. at 101.

Cournot's analysis: "[e]ither of the complementary monopolists would take note of the price charged by the other, would assume that his own actions would not affect the other's price, and would then set his price in an attempt to maximize his own profit."[19] According to Buchanan and Yoon this is "a game in which each owner tries to maximize her rent by setting the ticket price."[20] Parisi and DePoorter state that "competitive or oligopolistic supply of strict complements would paradoxically lead to higher prices, smaller output, and reduced welfare, compared to an alternative coordinated monopolistic pricing. The monopolist is no longer an endpoint on the spectrum of market models because complementarity pushes duopoly to higher prices and greater quantity restrictions than monopoly."[21]

21. The assertion that the record companies are a complementary oligopoly means that each record company is a monopolist that has very high market power. As complementary oligopolists, their market power is so substantial that they can require streaming services to pay them their individual profit-maximizing prices. The complementary oligopolists then are "price makers," that is, they choose and receive their individual profit-maximizing prices. There is no haggling or deal making with downstream firms. If the record companies were to operate as a complementary oligopoly, they would impose their individual profit-maximizing prices on streaming services without entering into negotiations with streaming services. If the record companies operated as a complementary oligopoly, the outcome would be inconsistent with record companies having low bargaining power. The record companies would impose their individual profit-maximizing prices on a take-it-or-leave-it basis, suggesting the record companies would have very high bargaining power relative to streaming services.

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[19] F. Machlup, F. and M. Taber, Bilateral monopoly, successive monopoly, and vertical integration, 1960, Economica, at p. 104.
[20] J.M. Buchanan and Y.J. Yoon, Symmetric tragedies: Commons and anticommons, 2000, The Journal of Law and Economics, Vol. 43, No. 1, pp.1-14, at p. 9.
[21] Parisi and DePoorter (2003).

I, Daniel F. Spulber, declare under penalty of perjury that the statements contained herein are true and correct to the best of my knowledge, information and belief. Executed on January 24, 2022 in Wilmette, Illinois.

Daniel F. Spulber

Daniel F. Spulber

Before the
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In re DETERMINATION OF ROYALTY RATES AND TERMS FOR MAKING AND DISTRIBUTING PHONORECORDS (Phonorecords III)	Docket No. 16–CRB–0003–PR (2018–2022) (Remand)

DECLARATION OF BENJAMIN K. SEMEL
REGARDING RESTRICTED INFORMATION

1. I am a partner at Pryor Cashman LLP, counsel for the National Music Publishers' Association ("NMPA") and the Nashville Songwriters Association International ("NSAI" and, together with the NMPA, the "Copyright Owners") in the above-captioned proceeding (the "Proceeding").

2. Pursuant to Section IV.A of the Protective Order issued in the above-captioned Proceeding on July 28, 2016 (the "Protective Order"), I submit this declaration in connection with the Copyright Owners' January 24, 2022 submission of additional materials pursuant to the December 9, 2021 and January 6, 2022 Orders of the Copyright Royalty Judges (the "Additional Materials Submission"), comprised of the following components: (i) Copyright Owners' Brief in Response to the Additional Materials Orders; (ii) Additional Written Direct Testimony of Richard Watt, Ph.D; (iii) Additional Written Direct Testimony of Jeffrey A. Eisenach, Ph.D; and (iv) Additional Written Direct Testimony of Daniel F. Spulber, Ph.D.

3. I have reviewed Copyright Owners' Additional Materials Submission. I am also familiar with the definitions and terms set forth in the Protective Order. Each of the redactions that the Copyright Owners have made to the publicly-filed version of the Additional Materials

Remand Submission is necessitated by the designation of that information as "Confidential Information" under the Protective Order by either one of the participants in this proceeding or by a non-party Producing Participant, as that term is defined in the Protective Order, or pursuant to the Order of the Copyright Royalty Judges dated July 20, 2021 in this proceeding (eCRB Docket No. 25481). Because the Copyright Owners are bound under such Orders to treat as "Restricted" and to redact information designated "Confidential Information" by Participants and Producers, they are doing so. Copyright Owners reserve all rights and arguments as to whether any such information is, in fact, "Confidential Information."

Pursuant to 28 U.S.C. § 1746, I hereby declare under penalty of perjury that the foregoing is true and correct to the best of my knowledge, information and belief.

Dated: January 24, 2022
New York, New York

_/s/ Benjamin K. Semel__________

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Proof of Delivery

I hereby certify that on Monday, January 24, 2022, I provided a true and correct copy of the Copyright Owners' Additional Materials Submission to the following:

Spotify USA Inc., represented by Richard M Assmus, served via ESERVICE at rassmus@mayerbrown.com

Nashville Songwriters Association International, represented by Benjamin K Semel, served via ESERVICE at Bsemel@pryorcashman.com

Pandora Media, LLC, represented by Benjamin E. Marks, served via ESERVICE at benjamin.marks@weil.com

Johnson, George, represented by George D Johnson, served via ESERVICE at george@georgejohnson.com

Amazon.com Services LLC, represented by Scott Angstreich, served via ESERVICE at sangstreich@kellogghansen.com

Google LLC, represented by David P Mattern, served via ESERVICE at dmattern@kslaw.com

Signed: /s/ Benjamin K Semel